

Bangor University

DOCTOR OF PHILOSOPHY

An exploration of mentoring among Indian School teacher A mixed-method study

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Award date: 2016

Awarding institution: Bangor **University**

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AN EXPLORATION OF MENTORING AMONG INDIAN SCHOOL TEACHERS: A MIXED-METHODS STUDY

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SEPTEMBER 2016

Dedicated to... Syed Shaharyar Alam Rizvi With Special Thanks

ABSTRACT

Researchers assumed naturally occurring mentoring (also called informal mentoring) to be non-existent among Indian school teachers. Therefore, in order to promote mentoring among them development of a program by organisations, which is called formal mentoring, has been suggested. However, the success of formal mentoring is related to collegiality and equality which is common in the West than in Asia. The hierarchical Asian culture was found to affect its outcome in previous research. Also, it is important to understand the concept of informal mentoring first, which is vague and highly contextual, if one wishes to promote formal mentoring. Therefore, this research scrutinises the context among Indian teachers for the (1) existence and concept of 'informal mentoring', (2) familiarisation with the term 'mentoring', (3) demographic factors which may affect the extent of informal mentoring received, (4) level of satisfaction with the present continuous professional development (CPD) practices, and (5) perceived preferences for informal mentoring, formal mentoring and supervision (i.e., the traditional analogous practice). A mixed-methods approach using questionnaires (N=171), semi-structured interviews (N=16) and documents (N=2) has been applied with six schools and an educational expert. The results confirm the existence of 'informal mentoring' among teachers and reveal its concept. The findings also illustrate that only few teachers are familiar with the term 'mentoring'. However, the situation varies between government and private schools. The demographic variables impact negligibly on the extent of informal mentoring received. Teachers are satisfied with the present CPD practices but there is a statistical significant difference between the participating schools. 98% of the participating teachers preferred mentoring to supervision. Interestingly, private and government schools differ in their preference to informal or formal mentoring. The adoption of 'formal mentoring' has been argued where 'informal mentoring' is embraced and can be promoted without intensive modifications. However, careful planning is suggested where teachers prefer formal mentoring.

ACKNOWLEDGEMENTS

There are many individuals who helped me in completing this project towards the achievement of the 'Doctorate of Education' (EdD) degree but first and foremost I would like to give thanks to Almighty and Most-Merciful Allah who has provided me with the means to aid me in this study. I pay tribute to Allah (s.w.t) for bestowing me with wisdom, knowledge, skills and strengths to accomplish this research and for his limitless love for all of us.

In addition, I would like to offer my gratitude to my parents, family and friends who encouraged me to enrol in this educational course and for being with me throughout the work. Without their emotional and financial support this project would have not been possible.

I am in debt to the School of Education, Bangor University, UK for providing guidance and constant support in terms of supervision and resources for this endeavour. The platform also provided opportunities for me to develop as a researcher through workshops, seminars, webinars, conferences and short-term courses.

Professor Janet Pritchard the former Head of School of Education at Bangor University when this project was conceived deserves a special tribute. She remained the main source to trigger and inculcate my interest in the field of mentoring through a module which she used to deliver for British school teachers. Attending this module was a great experience and inspired me to choose the subject 'mentoring' for thesis.

I would like to offer my special thanks and gratitude to my supervisors Dr Charles Buckley and Professor Enlli Thomas who provided me with valuable suggestions, encouragement and guidance throughout the process.

The non-academic staff at the school, especially Janet Thomas, and the Bangor University libraries also contributed to this effort by being readily available for advice. I pay tribute to all of them.

I also wish to thank the Ethics Board at Bangor University who approved this research, and to all the participants who co-operated by providing their valuable time and by sharing the required information willingly.

Lastly, I would like to show my appreciation to all the people who helped me on various occasions during this study.

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LIST OF ACRONYMS AND ABBREVIATIONS

ANOVA: Analysis of Variance.

BEd: Bachelor of Education.

BEIEd: Bachelor of Elementary Education.

BLO: Booth Level Officer.

BTRQ: Board of Teacher Registration Queensland.

CBSE: Central Board of Secondary Education.

CPD: Continuous Professional Development.

CSS: Centrally Sponsored Schemes.

CTE: Colleges of Teacher Education.

DIET: District Institute for Education and Training.

DPEP: District Primary Education Program.

DTE: Department of Teacher Education.

EFA: Education For All.

FGD: Focus Group Discussion.

HOD: Head of Department.

IASE: Institute of Advanced Studies in Education.

ICT: Information and Communications Technology.

INSET: In-Service Training.

IT: Information Technology.

JBT: Junior Basic Training.

JSTOR: Journal Storage.

MBA: Masters of Business Administration.

MCD: Municipal Corporation of Delhi.

MEd: Master of Education.

MINDS: Mentoring in Delhi Schools.

ACRONYMS AND ABBREVIATIONS

MNC: Multinational Company.

MPhil: Master of Philosophy.

MS-Excel: Microsoft Excel.

NCERT: National Council of Educational Research and Training.

NCF: National Curriculum Framework.

NCFTE: National Curriculum Framework for Teacher Education.

NCR: National Capital Region.

NCT: National Capital Territory.

NCTE: National Council for Teacher Education.

NFIE: National Foundation for the Improvement of Education.

NPE: National Policy on Education.

NTT: Nursery Teacher Training.

PMOST: Project Mass Orientation of School Teachers.

RPFRE: Report on Policy Framework for Reforms in Education.

RTE: Right to Education.

SCERT: State Council of Educational Research and Training.

SD: Standard Deviation.

SI: School Inspector.

SIE: State Institutes of Education.

SMS: Short Message Service.

SPSS: Statistical Package for the Social Sciences.

SSA: Sarva Shiksha Abhiyan.

SSt: Social Studies.

STEP: School Teachers Enrichment Programme.

T: Translated Statement.

TEC: Teacher Education Curriculum.

UKIERI: UK-India Education and Research Initiative.

GLOSSARY

Alternate Schools: They either involve 'education in a Gurukula' or 'education for life skills' (Samanvaya, 2008) and are different to mainstream schools which are focused herein. Therefore, such schools are not accounted for the examination of mentoring in this study.

Asian context: Geographical area including South-East Asian countries. It mainly referred to India, Pakistan, China, Sri Lanka, Bhutan, Nepal, Thailand and Malaysia in this thesis.

C++: A computer programming language.

Central Government: The governing authority of all Indian states and union territories is collectively referred to the Central Government (NPI, 2016).

Cloning: In academe it is referred to the situation when mentee starts imitating the mentor to an extensive degree (Johnson, 2007, p.28).

Coaching: It is a practice in which coach supports a learner for short time to achieve a specific and focused personal or professional goal.

Constellation of mentoring relationships: It refers to having many mentors at a given point of time (Searby, 2015).

Continuous Professional Development: It refers to all the learning activities which engage the participants to develop and enhance their abilities continuously. All efforts from small scale unstructured initiatives such as diary writing to structured practices such as supervision, coaching, tutoring, mentoring etc. come under the scope of it.

Formal Mentoring: The mentoring which is initiated by the organisation.

Government School: "A school run by the Department of Education of the Union Territory/ State Government/Local Authority as stipulated in Section 2 (h) of RTE Act 2009" (CBSE, 2012, p.3). However, the Central Government also manages few other schools such as Municipal Corporation schools, secondary/senior secondary, Sarvodya Vidyalayas and Kendriya Vidyalayas etc.

Informal Mentoring: The mentoring that initiates naturally among people.

Kendriya Vidyalaya: They are the system of Indian central government schools those are run by the Ministry of Human Resource Development. There are over a thousand such schools in India and three abroad (KVS, 2016).

Mam: Short for Madam.

Mentoring: It is usually a long-term passing on of professional and personal support, guidance and advice by a more experienced colleague (who has greater knowledge and

GLOSSARY

understanding) to another person or inexperienced member to facilitate overall development. Coaching is one of the skills of a mentor out of many.

Navodaya Vidyalaya: They are a system of schools run by Navodaya Vidyalaya Samiti, New Delhi, an autonomous organisation under the Ministry of Human Resource Development, Department of Education, Government of India (NVS, 2016).

Parentalistic Approach: A father like control over the employees.

Private Schools: They may be grant aided where Central Government pays tuition fees of students or fully independent from the Government by securing tuition fees and donations from students. These are run by different owners with the help of the members of school managements. Often, they are affiliated to the CBSE for sustaining desirable educational standards (CBSE, 2012).

Rajkiya Pratibha Vikas Vidyalaya: It is a system of schools run by the Directorate of Education, Government of Delhi, India.

Reverse Mentoring: A form of mentoring in which senior employee is in the role of a mentee and a junior employee is a mentor.

Supervision: It is an intervention that is provided by a senior member of a profession to a junior member. It includes the actions or processes of watching and directing what someone does or how something is done (Zepeda & Ponticell, 2004). This relationship is evaluative and the supervisor monitors the quality of professional services offered by supervisee/s and serves as gatekeeper.

Teachers: In-service school teachers unless not mentioned otherwise.

Union Territory: An administrative division which is directly ruled by the Indian Central Government (NPI, 2016).

Along with achieving a teaching qualification continuous professional development (CPD) of teachers is essential in the competitive world of today to cater to the ever-changing educational needs of a variety of students. This project embraces CPD through its 'broad view' rather than limiting its scope to a 'narrow view' which is widespread in many countries. Narrow view very often confines CPD to short-term training courses or one-time sessions for specific purposes (Padwad & Dixit, 2011). The broad view of CPD in the teaching profession is more prevalent in Western countries as compared to Asian developing countries such as India which embrace its 'narrow view' (Bolitho & Padwad, 2013; Kannan & Narayanan, 2015). CPD in its 'broad view' is a vast and flexible concept without limited boundaries which incorporates its 'narrow view' within it. Therefore, a wide range of activities come under the umbrella of CPD which can be categorised in many ways. In this project, they are classified in the following three ways depending on whether they are:

- (1) **Self-initiated** (e.g., diary writing, informal talk etc.) or **Agreed by a group of people** (e.g., informal feedback, guidance etc.) or **Planned by organisations** (e.g., observation, conference etc.),
- (2) **Self-centred** (e.g., action research, reflection etc.) or **Dyad based** (e.g., supervision, coaching etc.) or **Group oriented** (e.g., workshop, seminar etc.), and
- (3) **One-time** (group-discussion, webinar etc.) or **Short-term** (e.g., training, tutoring etc.) or **Long-term** (e.g., mentoring etc.).

A particular CPD activity may belongs to two or more categories mentioned above. In this research, CPD is considered to be "a planned, continuous and lifelong process whereby teachers try to develop their personal and professional qualities,...to improve their knowledge, skills and practice" (Padwad & Dixit, 2011, p.10) in order to serve manifold requirements of the students. The initiatives for such CPD could be from any of the above three groups. This project is based around the dyad based practices where two persons get directly involved in the CPD process for a set time-period to achieve certain goals. Such practices could either be self-initiated or planned by organisations and they may be for short-term or long-term. There are many dyad based CPD practices including tutoring

(tutor-tutee), coaching (coach-coachee) and training (trainer-trainee) and so on. The focus during this research has been on supervision (supervisor-supervisee), formal mentoring (formal mentor-formal mentee) and informal mentoring (informal mentor-informal mentee) among Indian in-service school teachers with a neutral perspective. These three practices have been scrutinised because of the keen interest of the researcher in mentoring and taking into account the fact that supervision is the normal accepted practice in most educational establishments in India.

This thesis is an original, independent and unpublished work by the author Arora, G. towards the achievement of EdD degree at Bangor University, UK. The author has completed schooling, graduation, post-graduation and BEd from different government institutions in Delhi. She also has work-experience of approximately 5 years in teaching primary and secondary sciences as a main subject teacher in four different private school settings in Delhi. In the course of her teaching career she has also remained interested and engaged not only in self-development activities as a teacher but simultaneously tried to seek opportunities to work as a member of a team to help other colleagues attain success in the teaching profession.

Her interests in 'International Teacher-Development' encouraged her to get enrolled for the EdD course in October 2010. Initially, she has successfully completed six taught modules of EdD including 'Bilingualism and Bilingual Education', 'TESOL', 'Educational Leadership', 'Thesis Proposal' and 'Research Methods in Education' along with a module called 'Developing Mentoring Skills' for in-service British school teachers which specifically facilitated her inclination towards the subject of 'Mentoring'. After finishing this module she has became particularly interested in research field of mentoring in relation to in-service school teachers and in exploring the concept of CPD as a whole. Such zest for the subject encouraged her to take 'mentoring among Indian school teachers' as a theme for her EdD thesis upon being given the go ahead by the supervisory team in 2012. This arrangement helped in tasks such as desk work, ethical approval, field work, data collection and analysis, presentations, attending conferences etc. which were required in order to accomplish this project and demonstrate researching skills.

Indeed, 'Mentoring' is a captivating subject to explore, understand and investigate in any context. It is especially interesting to examine it in the Indian context among school teachers because it has been one of the neglected areas of research so far. Depending upon the nature of relationships, there are many forms in which mentoring has been classified. These categories are briefed in Chapter-1 where the literature review has been presented.

Two kinds of mentoring that have been scrutinised in this project are 'formal mentoring' and 'informal mentoring'. The implementation of a 'formal mentoring program' has recently been recommended for Indian teachers in few prior studies when the notion of 'informal mentoring' was virtually assumed to be missing among them. Such recommendations are mainly either based on pilot studies or have derived from the baseline policy reviews with negligible prior systematic examinations of the factual context. The investigation to 'informal mentoring' in praxis, compatibility of 'formal mentoring' within the context among teachers and other necessary aspects have been ignored. The relevant transformations demand a thorough analysis due to various reasons but certain dimensions which appeared essential at prima facie stage have been taken into account in this project.

This empirical research has systematically explored the context of Indian schools through teachers keeping in mind five initial arguments which have been listed below and discussed in Chapter-1 of this thesis. These issues are raised due to the vague concept of informal mentoring and considering the fact that willingness of teachers is important for the success of formal mentoring. The identified discrepancies are based around,

- (1) The 'existence of informal mentoring' among Indian teachers.
- (2) The level of familiarisation with the term 'Mentoring'.
- (3) The effect of demographic variables on the extent of informal mentoring received.
- (4) The level of satisfaction with present CPD practices.
- (5) The comparison of perceived preferences towards formal and informal mentoring along with the traditional analogous CPD practice, i.e., supervision.

Based on the above concerns, research questions have been put forward in Chapter-1. There has been negligible research available with these interests so far and the lack of such research has encouraged the current project. Presently most of the mentoring investigations are from Western countries with a few studies in the Asian context, especially in India. The contextual differences between Asia and the West have been found to affect the outcome of formal mentoring in previous examinations. Literature review in Chapter-1 highlights the noticed incompatibilities between the 'Western concept of mentoring' and the 'Asian context'. However, it is an undeniable fact that the knowledge and experience acquired for mentoring from the West cannot be ignored while there is a need to investigate it in an Asian context. This is because 'mentoring' as a CPD

practice has originated and has been widely recognised in the West, particularly in the USA. Therefore, the rudimentary elements for its practice in the West act as a foundation to be scrutinised in other circumstances. Thus, this project has provided a platform to empirically investigate mentoring among Indian teachers in the light of available research from Asia and the West.

A mixed-methods approach including both quantitative and qualitative methods has been applied mainly using survey-questionnaires and semi-structured interviews. The participants are from six schools (3 government and 3 private) and a university in Delhi. The respondents include school teachers, members of school managements and stakeholders who have varied views in response to the research questions. The data collected from each method have been analysed separately and then integrated to represent the overall results. Further details with regard to the methodology have been discussed in the Chapter-2.

This project is limited to the work carried out in six schools from a single region of North India through a mixed-methods approach. It was not within the scope of this study to include more schools, different kinds of schools and alternate research designs due to monetary and time constraints of a doctoral degree period. However, the outcome from two broad categories of schools in India (i.e., government and private) has been compared. There is limited prior research for mentoring among Indian school teachers which restricted direct discussion of the results. Nevertheless, the comparisons through wider literature have facilitated the procedure and have helped to draw conclusions. The use of mixed-methods has also ensured the credibility of this project (see Chapter-2). The results are useful for further investigation of mentoring in India and elsewhere.

This thesis includes four chapters beginning with the literature review in Chapter-1. This chapter elaborates on mentoring practice and details the Indian system in relation to the CPD of teachers. It also presents the analysis of literature to justify the raised lines of enquiries as research questions. Thereafter, Chapter-2 summarises the adopted methodological approach accompanied by the analysis of the literature to generate research tools. The reasons for designing research tools instead of using pre-existing instruments have also been accounted for in this chapter. It also describes the procedures used in data analysis, ethical measures and credibility of the project. Chapter-3 presents the results obtained from using different methods for each research question. Lastly, Chapter-4 discusses the results in the light of the existing literature to draw conclusions and present recommendations. Implementations of this project and suggestions for future

research have also been put forward in this chapter. The next chapter now presents reviewed literature and the rationale for the research questions.

This chapter presents an analysis of literature relating to mentoring and the CPD status of Indian teachers. The issues relating to the existing policies and practices for adopting formal mentoring among Indian teachers have been highlighted. The gaps in the existing research in such attempts have been identified which in turn justified the research questions and the rationale of this study. This review is based on the sources available from ProQuest, ScienceDirect, JSTOR, SAGE, Wiley, Emerald and Google by using different combinations of key words (i.e., mentoring, formal mentoring, informal mentoring, supervision, coaching, CPD, India, teacher etc.) around the theme of this project.

The current international literature establishes the prominence of mentoring to facilitate CPD and evidences its prevalence in many countries such as in the USA (e.g., Hezlett, 2005; Chao, 2009; Barrera, Braley & Slate, 2010; Chun, Litzky, Sosik, Bechtold & Godshalk, 2010), the UK (e.g., Russell, 2007; Hobson, Ashby, Malderez & Tomlinson, 2009), Australia (e.g., Devos, 2010), Finland (e.g., Tähtinen, Mainela, Nätti & Saraniemi, 2012), France (Chalie's & Durand, 2000; Chalie's, Bertone, Flavier & Durand, 2008), Canada (e.g., Sharma, Loreman & Forlin, 2012), China (e.g., Lee & Feng, 2007; Wang, Tomlinson & Noe, 2010), Georgia (e.g., Weinberg & Lankau, 2011), Pakistan (e.g., Arifeen, 2010) etc. Relevant literature also shows its dominance in numerous professional areas such as Management (e.g., Weinberg & Lankau, 2011), Nursing (e.g., Marshall & Gordon, 2010), Social counselling (e.g., Buyukgoze-Kavas, Taylor, Neimeyer & Gu'neri, 2010), Sports (e.g., Tonidandel, Avery & Phillips, 2007), Industry (e.g., Allen, Lentz & Eby, 2006), Education (e.g., Awaya, McEwan, Heyler, Linsky, Lum & Wakukawa, 2003; Barrera, Braley & Slate, 2010) etc.

However, till now research on mentoring is found lacking universality, especially in India and this lack of study among Indians is an irony to mull over (Evans & Ave, 2000; Ramaswami & Dreher, 2010; Rekha & Ganesh, 2012). There are limited workplace mentoring related references found in the Indian context that mostly relate to IT, Business Administrations and MNCs along with few non-institutional concerns (e.g., Dayasindhu, 2002; Ghosh & Haynes, 2008; Ramaswami & Dreher, 2010; Pryce, Niederkorn, Goins & Reiland, 2011; Chandrasekar, 2012; George & Mampilly, 2012; Rekha & Ganesh, 2012; Khan, 2013; Arora & Rangnekar, 2014; Pandey & Chhaila, 2014; Arora & Rangnekar,

2015; Kochan, Searby, George & Edge, 2015). Only very few appertain to mentoring with regard to teachers and mostly are not systematic examinations (MINDS, 2010; Ray, 2011; Kapur, 2013; Kumar, 2013). Two of the references (i.e., MINDS, 2010; Ray, 2011) are pilot studies which upon successful completion recommended the adoption of formal mentoring among teachers in future and Kumar (2013) mentions an individual effort to promote mentoring among them. Only one systematic qualitative case-study by Kapur (2013) is found. These attempts are elaborated on later in section 1.2.5.

Nevertheless, a tendency towards formal mentoring has already been observed in India for a long time (e.g., Dayasindhu, 2002). Indian organisations have implemented formal mentoring programs successfully so far as to facilitate the transfer of knowledge (e.g., Ghosh & Haynes, 2008). It has been more of a preference than supervision in India, as anywhere else, because formal mentoring facilitates 'personal-development' of the employee in addition to 'professional-development' (e.g., Raabe & Beehr, 2003; Hobson *et al.*, 2009).

Consequently, to promote the CPD of Indian teachers, formal mentoring has been embraced in recent years compared to the conventional execution of supervision which has been found lagging behind to fulfil the ever-changing needs of teachers (e.g., Sharma, Yusoff, Kannan & Baba, 2011). The endorsement for formal mentoring among teachers has been reported from a small scale (e.g., Ray, 2011) to a larger level (e.g., MINDS, 2010). Interestingly, such attempts first have claimed the lack of the notion of 'informal mentoring' among teachers sometimes and have led to suggestions to adopt a 'formal mentoring program'. The fact is that the concept of informal mentoring is highly contextual due to its vague nature (Wildman, Magliero, Niles & Niles, 1992; Kent, Kochan & Green, 2013) which makes it a bit harder to identify. Moreover, there is a need to understand its contextual concept in order to promote formal mentoring (e.g., Elliott, 1995).

However, it is undeniable that Indian culture encourages formal mentoring because it facilitates strong social relationships and knowledge transfer between the employees (Dayasindhu, 2002). It has already been promoted successfully among Indian professionals other than teachers for career-management (e.g., Chandrasekar, 2012). Therefore, following the success of formal mentoring at a global level, similar attempts made among Indian teachers are appreciable. Yet, careful analysis of mentoring literature suggests a gap in our knowledge for this purpose and demands appropriate considerations prior to adopting 'formal mentoring' for teachers. Such vigilance is required to avoid its

negative consequences which are discussed later in section 1.1.8.

It has been noticed that "In India, once teachers take up a position they seldom contemplate alternative employment. Most of them retire from their teaching jobs" (Joolideh & Yeshodhara, 2009, p.134). Therefore, by accounting for the importance of a profession of an Indian teacher it is critically necessary to take the time to investigate the context before making alterations when a plethora of mentoring literature is already available. This examination is required because considering all the investments that one would need to make in terms of time, level of commitment and effort while mentoring, not everybody is motivated enough to participate in it (Rekha & Ganesh, 2012). Forced and unwilling participation in formal mentoring could be counterproductive as discussed later in the section 1.1.8.

Moreover, a high sensitivity has been observed in Indians for their context (Sinha & Kanungo, 1997) and "Whether or not a teacher learns and then engages in a form of professional change is influenced by the Indian mindset" (Singh, 2014, p.175). Singh (2014, p.175) also indicated that Indian teachers "organize their thoughts, feelings and actions in order to meet specific contextual demands. This holistic view enables Indian teachers to believe something else and practice something else". This could affect their productivity if a structured formal mentoring program based on Western concepts is to be imposed on them albeit the Indians and Western people have reported having common norms at some point of time (e.g., Au, 1999). This is because mentoring is highly contextual in its concept to be beneficial (Kent, Kochan & Green, 2013).

Overall, there are many issues to address in relation to mentoring among Indian teachers at present because it has remained one of the neglected areas of research so far. This project began the systematic examination for only five concerns which seemed important initially and these are discussed below in section 1.3. It is worth trying to comprehend mentoring practice and the Indian context before raising contradictions in the adoption of a formal mentoring program among Indian teachers. The sections 1.1 and 1.2 below elaborate on these subjects in more detail along with the conventional analogous practice of Indian teachers, i.e., supervision (NCFTE, 2009; FORTELL, 2011).

1.1 Mentoring

This section helps to develop understanding of mentoring by discussing its concept, benefits, drawbacks and types along with a comparison with supervision.

1.1.1 The Origin

The term 'mentoring' is believed to derive from Greek Mythology. According to this, Odysseus entrusted the guardianship of his son, Telemachus, to his friend, 'Mentor', before leaving for the Trojan War. But it was the goddess Athena, known for her wisdom and compassion, who protected and guided Telemachus in disguise of Mentor. Accordingly, the term 'mentor' has been used for a trusted person who can encourage the personal and professional development of the mentee by taking an intense interest and this practice is called 'Mentoring'.

Various scholarly and practitioner publications on mentoring began appearing in the late 1970s and early 1980s (Hezlett & Gibson, 2005). The earliest report on mentoring in literature is presented by Kanter (1977) when she interviewed 20 saleswomen in a business firm (called Indsco) in the US to investigate the 'gender-effect' in relation to 'organisational behaviour'. In her case-study she noticed the natural practice of providing 'informal support' to a young junior employee by another older and senior employee. Such an action has later become known as 'mentoring' in literature. Thereafter, Levinson, Darrow, Klein, Levinson & McKee (1978) showed the importance of having a mentor in early adulthood when interviewed 40 men to collect longitudinal data in the US. In 1979, Roche noted the successful facilitation of corporate executives through 'informal relationships' when he quantified the prevalence of mentoring using a survey with 1250 participants in the US.

However, the first wave of 'formal mentoring program' is noticed in the 1980s (Murray, 2001; Touchton, 2003; Tenner, 2004; Zellers, Howard & Barcic, 2008). Kram has played a key role since early mentoring research first started (1980; 1983; 1985; 1988; 1992; 1996; 2001; 2004; 2007). She has contributed immensely to developing an in-depth understanding of 'mentoring-relationships'. She has also revealed the benefits of mentoring and provided a recognisable platform for it in the world of social research. She has first described mentoring as:

"...a relationship between an older, more experienced mentor and a younger, less experienced protégé for the purpose of helping and developing the protégé's career" (Kram, 1985 cited in Ragins & Kram, 2007, p.5).

However, the concept of mentoring has evolved with time and is discussed below to grasp the notion. It is important to do so in this study to understand the tactic that was employed when questionnaire was developed.

1.1.2 The Concept

The definition or concept of mentoring provided by Kram, along with many others, has not been universally accepted (Hawkey, 1998; Mathews, 2003; Bozeman & Feeney, 2007; Hobson *et al.*, 2009; Haggard, Dougherty, Turban. & Wilbanks., 2011). Literature reports around 50 definitions of mentoring which convey its concept differently (Jones & Corner, 2012). Researchers have been found mentoring a complicated and contradictory word to define. The concept has been elaborated on but it has not been possible to come to a uniform interpretation yet (Mertz, 2004).

Previously it was assumed that only seniors and old people could mentor juniors and youngsters. However, the concept of mentoring has evolved with time and has illustrated that mentoring is associated with experience, relevant knowledge and skills instead of depending upon 'age or seniority' of the participants (Dansky, 1996; Russell & Adams, 1997; Allen, Lentz & Eby, 2006). The models for 'peer-mentoring' are mentioned where peers mentor each other (Godshalk & Sosik, 2003), and the concept of 'reverse-mentoring' is also explained (Greengard, 2002) where juniors mentor seniors or youngsters mentor older people.

Moreover, mentoring is not confined to a one-to-one long-term relationship but the concept of a 'constellation of mentoring relationships' (Higgins & Kram, 2001) is popular nowadays where one could have many mentors in a time-period or at the same point of time. Therefore, at present it has been defined based on 'unequal knowledge' held by the participants rather than dissimilarity in their age or organisational position (e.g., Bozeman & Feeney, 2007; Huizing, 2012). For example, mentoring (irrespective of context, age and organisational position) seems better defined as:

"...a process for the informal transmission of knowledge, social capital, and psychological support perceived by the recipient as relevant to work, career or professional development; mentoring entails informal communication, usually face-to face and during a sustained period of time, between a person who is perceived to have greater relevant knowledge, wisdom or experience (the mentor) and a person who is perceived to have less (the protégé)" (Bozeman & Feeney, 2007, p.731).

This statement relates mentoring 'to transfer knowledge or skills' (for a particular theme) from a person who has more of it to another who has lesser. Such actions are free from the designation or age of the participants. This assumption seems more in keeping with all the different forms of mentoring that have been referred to above.

1.1.3 Informal and Formal Mentoring

With a few exceptions (e.g., Hezlett & Gibson, 2005; Zellers, Howard & Barcic, 2008) that state there is no difference between the outcomes for formal and informal mentoring, most researchers (e.g., Sambunjak, Straus & Marusic, 2006; Dobie, Smith & Robins, 2010) think otherwise. This is because both the types imply different dynamics and consequences among the participants (Wanberg, Kammeyer-Mueller & Marchese, 2006; Liu, Liu, Kwan & Mao, 2009). Only Bozeman & Feeney (2007) do not qualify 'formal mentoring' as mentoring at all in their review of the literature. This perception can be overruled because the acceptance of the notion of 'formal mentoring' is nearly universal. It is necessary to understand the differences between them and their ultimate effects on the participants (Allen, Day & Lentz, 2005; Hezlett & Gibson, 2005) in this study which deals with both of them.

The relationships which develop naturally are called 'informal mentoring' (Scandura & Siegel, 1995; Allen, Lentz & Eby, 2006) and the assigned relationships are recognised as 'formal mentoring' (Ehrich, Hansford & Tennent, 2004). Informal mentoring can occur non-apparently without official recognition (Floyd, 1993; Russell, 2007). Informal mentoring is spontaneous and can be initiated by either participant, mentor or mentee, with a natural move towards it without external interference (Roche, 1979; Noe, 1988; Arifeen, 2010). Conversely, formal mentoring is planned and established through organisations by matching the pairs of mentors and mentees with the aim of sharing organisational knowledge and advancing the careers of the employees (Chun *et al.*, 2010). These are the basic and major differences between the two. A few other differences are highlighted later in Table 1.1 and a more elaborate comparison is presented in section 2.6.2 in the next chapter when the development of research tools is discussed.

The slight difference in the origin of relationship has been found to impact on the potential of the two practices. Assigned mentoring, as compared to naturally originated mentoring, has been reported to have fewer achievements (Wunsch, 1994; Ragins & Cotton, 1999; Zellers, Howard & Barcic, 2008) and most of the negative influences have been associated with it. Hence, some researchers (e.g., Zellers, Howard & Barcic, 2008, p.563) asserted that "formal programs should not be viewed as substitutes for informal mentoring". This suggestion is one of the core elements in this project while the investigation and promotion of the concept of informal mentoring among Indian teachers was deemed necessary before recommending formal mentoring.

However, it is also undeniable that "contemporary workplaces do not afford all of their members equitable access to informal mentoring relationships" (Zellers, Howard & Barcic, 2008, p.564). Also, informal mentoring has not always been better than formal mentoring (e.g., Ragins, 2002). Therefore, a formal program could facilitate mentoring opportunities where no mentoring is otherwise initiated. Consequently, most organisations have been recommended to promote formal mentoring to support the CPD of the employees nowadays. On the whole, both types of mentoring have their own benefits and pitfalls. Therefore the importance of formal mentoring for Indian teachers cannot be ignored either but the transformation should be applied with appropriate tactics.

1.1.4 The Misconceptions - 'Mentoring' or 'Supervision'

This project compares mentoring with the traditional analogous practice of Indian teachers, i.e., supervision. Therefore, it is worth noting and somewhat surprising that many researchers have perceived 'supervision' and 'mentoring' as a similar practice on many occasions though they are different (e.g., Crasborn, Hennissen, Brouwer, Korthagen & Bergen, 2008; Perunka & Erkkilä, 2012). The terms 'mentoring' and 'supervision' or 'mentor' and 'supervisor' have been used interchangeably in literature without considering the differences between them. For example, Perunka & Erkkilä (2012) defined mentor as a supervisor and Josefowitz (1980) described a mentor as akin to a supervisor.

Hennissen, Crasborn, Brouwer, Korthagen & Bergen (2008) used the term 'mentor' for the person who undertook supervisory activities on behalf of the 'supervisor'. The teacher-education plan in Norway also used different terms (i.e., supervision, coaching and cooperative teaching) for mentoring depending upon the situation (Sundli, 2007). However, mentoring does indeed differ from coaching and supervision. Coaching focuses on a specific goal to be achieved whereas mentoring facilitates overall development in one go. Coaching is one skill of a mentor out of many. The difference between coaching and mentoring is not an issue to discuss in this project (appendix-1 for the interested) but has been mentioned here because results have addressed both practices simultaneously at a point as shown in Chapter-3. It has been noticed that similar misconceptions between mentoring and supervision have hindered CPD through reflection and have deceived the participants on many occasions (Kvale, 1998).

Moreover, a review of mentoring literature (based on 124 articles from 10 journals for the time range of 30 years beginning from 1980) by Haggard *et al.* (2011) highlighted a

number of studies where either 'mentoring' was exercised within a 'supervisor-subordinate' relationship (e.g., 85% in Burke & McKeen, 1997) or people (who self-identified themselves as 'mentee') identified their 'supervisors' as their 'mentors' (e.g., 97% in Day & Allen, 2004). It was also found that if 'supervisors' who were also 'mentors' were excluded, the number of mentees was noticeably lower (e.g., 33% in Ostroff & Kozlowski, 1993). Hence, Haggard *et al.* (2011) argued for the studies which allowed the supervisor to be tagged as a mentor. They suggested that 'supervisors' who are also 'mentors', should be considered as 'mentors' only because an effective supervisor may not be an impressive mentor.

Keogh, Dole & Hudson (2006, p.1) elaborated on how with the "adoption of the word mentor rather than supervisor, a more collaborative, supportive and equitable relationship is assumed and anticipated. Yet, [the] old ways of 'supervising' persist" in practice in two case studies with 2 pre-service teachers in England. The literature (e.g., BTRQ, 2004) shows that in the above circumstances people may take a different view of mentoring mixed with supervision relating it to the times when they were supervised in their own career or were in a supervisory role in the past. This could lead to misunderstandings while mentoring and can cause a negative impact (e.g., Hardy, 1999; Beck & Kosnick, 2000; Maguire, 2001; Smith & Maclay, 2007). Therefore, there are disagreements about mentors also being supervisors and vice-versa (Marable & Raimondi, 2007).

Consequently, it has been recommended to distinguish supervision from mentoring in a study which deals with both of them simultaneously to avoid confusion and to have clarity in results (e.g., Bozeman & Feeney, 2007).

1.1.5 Mentoring and Supervision

Many researchers (e.g., Lee, Dennis & Campbell, 2007) agree that mentoring differs from supervision. According to Lee, Dennis & Campbell (2007), a mentor allows you to develop and discover insights while a supervisor micromanages the ideas and stifles the subordinate. Sullivan & Glanz (2000) distinguished mentoring from supervision by calling it a collaborative, non-judgemental and confidential practice. It has also been noticed that a mentor usually avoids the hierarchy associated with supervision to promote collaboration (Awaya *et al.*, 2003). The literature shows that supervisors who have usually been associated with pop-in visits are best out of reach and lacking in observational skills whereas mentors support regular informed visits to share responsibility and to offer

knowledge, advice, criticism and guidance (e.g., Batteson, 1998).

Chao, Walz & Gardner (1992) in a longitudinal study in the US through a survey of 549 alumni members from 9 graduating classes noted that the least facilitation of 'career-development' was done by supervisors and confined it to the ability of mentors only. Wang & Ha (2012, p.57) when worked with 22 participants including 19 teachers in Hong Kong agreed that old teachers received knowledge and experience from the new teachers when mentoring. They found it converse to the 'top-down' hierarchical approach in supervision where old teachers are deliverers and new teachers are recipients.

1.1.6 A Combined Comparison

The information above and in this section is a brief for a combined comparison between supervision, formal and informal mentoring and a more detailed comparison is presented in section 2.6.2 when the development of instruments for this research has discussed. A general conclusion from Table 1.1 places supervision and informal mentoring at the opposite ends of the continuum ranking with formal mentoring in between. The idea of comparing these practices along a continuum has also been explained in Chapter-2.

Table 1.1 Basic Differences among the Three Practices

Supervision	Informal Mentoring	Formal Mentoring
Hierarchical.	Non-hierarchical.	May be hierarchical or non- hierarchical.
Assigned by organisation	Naturally developed	Assigned by organisation
Evaluative	Non-evaluative.	Evaluative or non- evaluative
Participants cannot exchange their roles.	 Participants can exchange roles willingly. 	Participants can exchange roles if permitted by organisation.

1.1.7 Mentoring in Education-Various strata

Mentoring in education (e.g., Devos, 2010; Gordon & Brobeck, 2010) has been reported to

have been exercised within the following hierarchical dyads:

- 1. University academic member-School Principal (Casavant & Cherkowski, 2001).
- 2. School Principal-School Principal (Daresh, 2004; Draves & Koops, 2011).
- 3. School Principal-School Teacher (Hopkins & Grigoriu, 2005; Tillman, 2005; Menon, 2012).
- 4. School Teacher-School Teacher (Sosik, Lee & Bouquillon, 2005; Barrera, Braley & Slate, 2010; Avalos, 2011).
- 5. School Teacher-Student (Hezlett, 2005; Smith & Stormont, 2011).

This study has focused on the 'school teacher-school teacher' dyad in Indian schools.

1.1.8 The Potential Benefits and Hindrances

The list of advantages of mentoring is limitless in the literature but the recurring benefits are included here. Mentoring literature shows its benefits for teachers in the form of,

- (a) Providing job satisfaction by giving learning opportunities throughout the career (Luna & Cullen, 1995; Murray, 2001; Carr, Bickel & Inui, 2003; Luecke, 2004),
- (b) Induction of new teachers by making them familiar with the school system and by helping them to learn context-based teaching strategies (Ingersoll & Strong, 2011),
- (c) Retention of teachers in the school by providing support to make them feel comfortable and accepted in the profession and context (Murray, 2001; Carr, Bickel & Inui, 2003; Kreitner & Kinicki, 2004; Luecke, 2004), and
- (d) Providing opportunities to reflect on own practice for self-improvement by exposing them to new perspectives (Jossi, 1997; National Academy of Sciences, 1997; Beans, 1999; Murray, 2001; Alpert, Gardner & Tiukinhoy, 2003; Johnson-Bailey & Cervero, 2004).

There are many other benefits which are out of the scope of this research to catalogue and discuss because they are not the main focus of this study. Consequently, mentoring relationships have been introduced artificially among employees as 'formal mentoring' to reap the benefits that one could derive from informal mentoring.

In spite of its numerous benefits, it is important to note that mentoring is not free from pitfalls. Further intensive investigations in different social settings have reported the

harmful effects of mentoring on the participants. The negative experiences have been collectively addressed as the 'dark side' of it in the literature (Duck, 1994; Scandura, 1998). For example, Eby & Allen (2002) reported some negative mentoring experiences in a survey with 242 employees (out of 391) who were in different accounting-related occupations in the USA. In conclusion, they illustrated "that this predominately positive emphasis [on mentoring] may be somewhat misguided" (p.473). Some of the identified negative experiences in literature are:

- (a) Lack of trust among participants (Chun et al., 2010),
- (b) 'Power differences' (McDonald & Hite, 2005), i.e., when the mentor tries to dominate the mentee,
- (c) Specific mentor behaviour and actions such as sabotage, i.e., taking credit for the work of the mentee,
- (d) Compatibility issues such as personality clashes and different value systems,
- (e) Incompatible patterns of interactions such as not being available and accessible when required,
- (f) Blaming the mentor for the slow progress of the mentee (Eby, McManus, Simon & Russell, 2000; Eby & Allen, 2002; Alpert, Gardner & Tiukinhoy, 2003; Shulman, 2004), and
- (g) Cloning (Johnson, 2007; Ramirez, 2012).

However, the negative experiences are mainly limited to formal mentoring when planned inappropriately. Informal mentoring has lesser negativity due to natural initiation of relationships and its flexible nature. The careful arrangements for formal mentoring have only produced fruitful results (Hopkins-Thompson, 2000; Bramley, Burke, Lau, Marentette & Tallman, 2012). Therefore, the importance of this project can be understood at the planning stage when 'formal mentoring' has been endorsed for Indian teachers.

1.2 Indian System for CPD of School Teachers

To contemplate mentoring, either formal or informal, and supervision in relation to Indian teachers, or especially to examine the suitability of a 'formal mentoring program' for them, it is necessary first to assess the capacities of the system itself. This section helps to develop such insights.

1.2.1 The Journey Thus Far

The concept of CPD of teachers or one should say 'teacher-development' is recent in India because most prior efforts were either for 'teacher-education' or 'teacher-training'. Therefore, it is one of the areas of interest nowadays (Bolitho & Padwad, 2013). It is worth acknowledging previous attempts before pointing out the weaker areas of understanding in neoteric efforts towards promoting CPD.

The journey of 'teacher-development' in India is easy to trace because there was no formal teacher-education system before the independence of the country from England in 1947. However, the idea of 'Basic-Education' by Mahatma Gandhi had already triggered the need to educate teachers in 1937 as a co-product (Mazumdar, 1963) but until the late 1980s no specific actions were taken towards it.

After Independence, following the setup of the NCERT (1961) and 'The Kothari Commission' (1968), the Government of India established the SIE and DTE (within NCERT) to facilitate teacher-education. In 1978, the NCF was promoted and TEC was introduced. The NCERT also set up the NCTE in 1978 to review the standards of teacher-education. Later, the NPE (1986) realised the need to improve the status and professional competence of teachers to improve the quality of teaching whereas a rise in the number of teachers was also required simultaneously.

Overall, it was a quantitative *vs.* qualitative demand of teachers. Hence, circumstances dictated the necessity of lowering the basic entry-level qualifications for teacher training institutes at that time. Therefore, to improve the status and professional competence of teachers, the CSS in 1987 was set up to restructure and reorganise teacher-education. It was NPE (1986) which presumed teacher-education to be a continuous process from 'pre-service' to the 'in-service' stage and emphasised decentralising the system to achieve goals. Consequently, DIET, CTE, SCERT and IASE were established to work closely with in-service teachers to provide *in-situ* support.

To strengthen the decentralisation process, the NCTE (1978) framework was also revised in 1988. To implement these reforms, educating teachers and additional roles for teachers were sought as a matter of necessity (Sharma *et al.*, 2011). Apart from this, PMOST was launched in 1986 to support half a million primary and secondary teachers through 10,000 orientation camps that were held in 2500 training centres. It was a three-tier training scheme which involved the training of 'key personnel' by NCERT; 'resource persons' were to be trained by 'key personnel' and teachers by 'resource persons'.

Afterwards, the implementation of DPEP in 1990, SSA or EFA in 2001 necessitated developing the teachers rather than just educating them. For this to occur, about 257 DIETs were sanctioned by 1992. Each DIET consisted of 7 academic branches with one of their functions to train teachers (both pre-service and in-service). The suggested average annual intake was 40 for pre-service training and 600 for in-service training at that time (Avalos, 1993). The standard of teacher-education was also regulated throughout the country by NCTE in 1993 to enhance the system in accordance with the planned strategies.

Later, the DPEP (1995-2003) set up 'Block and Cluster Resource Centres' across the country to train teachers in 'learner-centred pedagogic methods' and 'school based support'. This attempt seems to be a shift from the idea of 'inspections to supervise the progress of teachers' towards 'providing help to support their development'. Then SSA also emphasised that each teacher should receive 20 days of training every year.

In terms of the curriculum framework for teacher-education, the first was set up by the statutory NCTE in 1998, following an independent framework by the NCERT in 2005 and a joint framework by NCTE and NCERT in 2006. A few years ago, NCFTE (2009) was established to evaluate the teacher-education system. It stresses INSET programs, CPD, and preparation of teachers and teacher-educators. After its implementation, the expectation is for an adequate supply of professionally competent teachers. In recent years, other localised attempts have been made to promote the CPD of teachers and these have been discussed later in section 1.2.5.

Considering the size of the Indian population (app. 1.28 billion in 2015) and the demands on the system, there is an endless list of appreciable efforts made by the authorities towards improving CPD of teachers. However, at present "the CPD scenario in India seems to suffer from a dual handicap – there is little top-down support...for CPD beyond INSET, while there are also few instances of bottom-up initiatives and efforts by teachers to take responsibility for their own CPD" (Bolitho & Padwad, 2013, p.8). Teachers usually become content with INSET managed by agencies and hardly search for the alternative options for CPD.

The CPD strategies seem to be influenced by the approach of maintaining theoretical knowledge of scientific research superior to the practical knowledge of teachers. Hence, theory to teacher-development emerged as 'skills to apply' by teachers rather than the 'professional will' to get along. In reality, teacher-development in India, as elsewhere, is "a vastly more complex enterprise than simply providing teachers with improved

knowledge and skills" (Dyer, Choksi, Awasty, Iyer, Moyade, Nigam, Purohit, Shah & Sheth, 2004, p.40). The cascade Indian system trains higher officials who in turn are entitled to train others at lower levels to implement policies irrespective of whether they possess the relevant skills for delivery or whether all the teachers require similar skills (Sheeba & Nath, 2009). Therefore, the need to understand the obstacles to CPD of teachers in India is crucial.

1.2.2 Impediments to CPD of Indian Teachers

The main factors which seem to affect the process are:

1. **Dominated centralised system**: India has embraced the centralised top-down approach to CPD of teachers since independence. It has been reported that most of the prior attempts have been less effectively implemented than expected and educating and training of teachers is still dominant rather than their own development (Dyer, Choksi, Awasty, Iyer, Moyade, Nigam & Purohit, 2002; MINDS, 2010).

Sheeba & Nath (2009, p.1) pointed out that the Indian system is improving but there is minimum attention towards teacher-education. The system is stationary in practice despite the philosophical and methodological improvements in the policies. The traditional centralised access to policy-making and the top-down approach to their implementation has been changing under the decentralisation processes but it has been less fruitful so far (Dyer, 2000).

The planning and coordination of teachers usually occur at two levels (i.e., central and state) because of the federal nature of the Indian system. The distribution of powers between the two Governments is determined by constitution. State arrangements vary between zones, districts, blocks, villages, municipalities and municipal corporations. Therefore, the quality of teaching varies accordingly.

The Central Government functions along with the 'State Planning Boards/ Commissions' and 'District planning units' through various institutions at different levels. The Central Government deals with financial, technical and regulatory procedures and State Government takes organisational and structural decisions for teachers.

Nevertheless, interventions by the Central Government in the decisions made by the State Governments dominate which somehow inhibits their capacity to take localised decisions in line with the needs of teachers in a particular state.

- 2. Rule of Theory: Theoretical knowledge seems to dominate over the importance of practical skills and there have been fewer attempts "made towards comprehensive, qualitative evaluation covering professional attitudes and values and provision of sustained engagement" with teachers (NCFTE, 2009, p.40). Moreover, the 'Schools of Education' (and other related disciplines) give little emphasis to dealing with real classroom problems, and focus more on the history and philosophy of education (Muralidharan, 2013). Therefore, teachers seem to have a less than expected professional attitude, and have been demanding in-service development strategies to fulfil their 'contextual needs' (e.g., Mooij, 2008). There are fewer such initiatives in the present system.
- 3. Under-equipped DIETs: In the process of decentralisation, the State Governments have attempted to improve the quality of teachers by setting up DIETs (RPFRE, 2004). At present, DIETs are under-equipped and occupied by less professionally qualified and experienced staff than expected in the policies. The present forms of either BEd or MEd courses are less advantageous in producing effective teachers and teacher-educators respectively. Mostly the undeserving teacher-educators help teachers to implement policies which seem to cause problems (Sheeba & Nath, 2009). Hence, there is a scarcity of *in situ* school-based remedies to incorporate centralised policies and to take decisions for the facilitation of the development of teachers.
- 4. Low facilitation to CPD: The need to enhance the quality of teachers has been recognised in the official documents for a long time (Dyer *et al.*, 2002). However, the implications of such suggestions to promote CPD seem complex because such a large number of people enter the teaching profession (the third largest workforce) and the notion of CPD "is not yet a widely recognised or acknowledged concept in India" (FORTELL, 2011, p.32). Therefore, the system struggles to ensure the supply of professionally competent teachers (NCTE, 2009) which in turn appears to suppress the assurance of uniform standards in the teaching profession.
- **5.** Lack of Responsibility: A quite complicated situation in terms of taking responsibility for CPD of teachers is highlighted by Padwad & Dixit (2013) while data were collected through questionnaires, interviews and focus-group discussions from teachers, other school members, education officers, students and parents among

7 schools in two towns of Maharashtra state in India. They noticed that the system and teachers both blame each other for lagging behind though they do accept their accountability towards CPD.

The system claims that "CPD is an individual teacher's own responsibility" (Padwad & Dixit, 2013, p.16) whereas teachers "are led to believe that CPD is the state['s] responsibility and that they are incapable of doing anything on their own. Teachers' voluntarism, initiative and efforts to initiate and support their own CPD are quite rare" in the system (Bolitho & Padwad, 2013, p.7).

Therefore, most of the teachers are traditional 'textbook based teachers' who impede free-thinking for the sake of development. They usually remain at the receiving end of the authorities to deliver the accepted content without reflecting on the whole scenario which in turn hinders the attempts towards CPD (Mathew, 2007). However, it is also noted in the RTE that the voices of those teachers who have a positive attitude towards CPD, "have either not been communicated to or not been accepted by the education[al] 'establishment' in India' (Muralidharan, 2013, p.36) which in turn discourages them. Such an approach obstructs them from being a part of the policy formation process and from discussing real world problems and possibilities.

Taking responsibility matters most to improve the circumstances and this issue has to be elaborated on further. Therefore, it is worth detailing the attitude of teachers toward their CPD and the value of their experiences in the existing CPD practice (i.e., supervision-analogous to mentoring) offered by the system. The two consecutive sub-sections below help to develop insights for these purposes.

1.2.3 Attitude of Teachers towards CPD-The Organisational Impact

The attitude of teachers towards CPD is an important factor that facilitates it (Bennett, Braund & Lubben, 2010). CPD activities usually include taking new roles and responsibilities whereas only "A few teachers show their willingness to go beyond the routine job and learn new skills" (Singh, 2014, p.166). This is so because Indian teachers have less freedom to take decisions due to system controls which in turn make their self-efforts useless sometimes and discourage them towards CPD (Bolitho & Padwad, 2013). The arrangements usually vary within the 'organisational-sector', i.e., government or private (Cheney, 2005; Shah, 2013) and affect the attitudes of teachers differently. The

organisational-sector has noticeably influenced the outcome of earlier research with Indian teachers as well (e.g., Anas & Abdul Azeez, 2011).

In India, it is important to understand the standpoint of government and private schools because "Following tradition that dates from its past as a British colony, "public schools" are actually private schools. Schools that much of the world would call "public" schools are called "government" schools in India" (Hanzelka, 2007, n.p.). A genuine comparison between the two types of schools in India is crucial (Singh, 2007) albeit it is required in this study to understand the effect of the 'type of school' on the attitudes of teachers towards CPD. The factors which often seem to affect the attitude of teachers towards CPD are discussed below in relation to the 'type of school'.

The level of job security: Private school teachers are generally appointed through interviews (rarely accompanied by written exams) with the school managements. Places could also be secured by accepting a lower salary for a fixed term at times because of the stiff competition for jobs (Mooij, 2008). Such schools hold complete autonomy to hire or fire teachers from the job. Therefore, teachers usually work harder out of fear of losing their job if their performance is not as good as expected (Kremer, Chaudhury, Roers, Muralidharan & Hammer, 2005). Consequently, they often remain committed to CPD in order to secure better jobs.

On the other hand, government school teachers are appointed by either the Central or the State Government after centralised written exams and interviews but the dismissal of teachers in such schools is rare. Kremer *et al.* (2005) when investigated teacher absence rate through a survey at the national level among 20 states in 3,700 primary government and private schools found only one dismissal by a Head teacher in nearly 3,000 government schools. This was due to repeated absence. Mooij (2008) also pointed out low teacher absenteeism in private schools as compared to government schools when examined the context of Andhra Pradesh state in India through focus-group discussions and interviews with 20 teachers.

In brief, teachers in government schools seem to have more secure jobs as compared to private schools which may affect their interest in CPD.

— **Professional motivation**: Mooij (2008) found that most of the experienced government school teachers listed 'respectable status', 'opportunities to mould

children to be good citizens', and 'the inspiration from their own teachers' as motivation to join the profession. However, novice teachers regarded the responses of mature teachers as idealistic and referred to 'earning money with a secure job' as the reason to be a teacher. A few other teachers chose it as a last option in the career building. Low motivation to join the profession may affect attitude to CPD. Mooij (2008, p.515) also highlighted that some teachers thought "that a career in a government school is worth much less than a career in an English-medium private school". Those teachers felt that private school teachers get more opportunities of career-development which keep them motivated towards CPD. There could be some truth in this because private schools frequently arrange CPD activities for teachers to maintain their profile.

— **Workload**: Excessive non-academic tasks in government schools include "election duties, participation in census operations, pulse polio campaigns, economic surveys and other activities that have nothing to do with education *per se*" (Mooij, 2008, p.520) along with "an amazing amount of forms and registers that has *[sic]* to be filled in every month" (Mooij, 2008, p.520). Some of the aforesaid duties are door-to-door. Perhaps this useless drain of energy could add to the reasons for less encouragement towards CPD. Private school teachers also need to put in more effort but in different ways and mostly within the schools.

The workload in terms of the number of students per class also has an effect. Taylor (1991, p.331) when discussed transformational proposals of that time in India pointed out how "a pattern of delivering sermons and a stylised catechism of question-and-answer exchanges" occur in government schools due to large class-sizes whereas private school teachers with fewer number of students mostly applied heuristic methods. Such differences still exist in the system and may hinder the positivity held by a teacher for CPD.

— Appreciation: Government school teachers were sometimes found to welcome serious monitoring because the inspectors usually check the maintenance of registers and forms while ignoring the quality of the teaching (e.g., Mooij, 2008). Such inspections have been criticised for lacking constructive feedback and are executed to control the teachers (Majumdar, 2005). In such arrangements, under the "educational"

bureaucracy demand progress, teachers are forced to fill in false data" sometimes to maintain their dignity (Mooij, 2008, p.520).

Despite criticism the inspection system so far has been led by less qualified people who have fewer skills to provide feedback (Sharma, 2000). Sharma (2000) when discussed the Indian school system highlighted the fact that many inspectors are either high school teachers who are promoted as inspectors, or, if selected through public examinations, have little or no professional training. Hence, they lack a professional attitude and show less appreciation of hardworking motivated teachers.

Mooij (2008, p.518) reported that inspectors in government schools "always try to find fault with the teachers' work and do not even give a word of appreciation to a hard working teacher". He also noticed inspectors sometimes yelling at teachers in front of others which made them feel embarrassed. Mooij also pointed out towards the politicisation in the reward system which could also de-motivate hard working teachers from CPD. Conversely, private school teachers somehow secure appreciation due to the localised nature of rewards and openness of the system to parents and society.

Opportunities to express willingness: Teachers have been demanding a place to 'have a say' in decision-making powers; however, the "government culture remains very much one of action governed by orders" for them (Dyer *et al.*, 2002, p.349). Such arrangements usually leave a number of teachers in an uncomfortable situation while applying the policies in the classroom (Dyer *et al.*, 2004). It could be the reason why Singh (2007) assumed that private schools are better than government schools in teaching-methods and teacher-competence because they are usually autonomous. The process in private schools is more focused on specific needs of schools and provides practical remedies for teachers. The activities are usually planned through the joint initiatives of private school management and the teachers. Such a strategy encourages teachers to move towards CPD willingly.

Until recently, there was a negligible attention to the perceptions of teachers for self-development in India (Singh, 2014). The reasons for such observations seem to be based around the existing trends which provide insignificant space to the voices of teachers in the system. Therefore, supervision which is currently an analogous CPD practice to mentoring in the India has been elaborated on further below in terms of valuing the

experience of teachers.

1.2.4 Supervision-Space for Voices of Teachers

'Supervision' through an 'inspectoral system' in government schools and by the different designated officials such as facilitator, HOD, observer, co-ordinator etc. in private schools has been prevalent in India (e.g., Sriprakash, 2011; Sharma *et al.*, 2011). The introduction of the inspectoral system among Indian teachers can be traced back to 1839 when having a single superintendent to inspect the government district schools was suggested by Lord Auckland and an inspector was appointed in 1841 for the schools and colleges in Bengal, Bihar and Assam states of India (Sharma, 2000).

Taking into account focus and purpose, supervision can vary in its concept from a 'custodial orientation' to a 'humanistic orientation' (Wanzare & Costa, 2000). The 'custodial orientation' means 'general overseeing and controlling' (Drake & Roe, 1999) along with the evaluation of progress whereas 'humanistic orientation' relates to 'a multifaceted interpersonal process' to facilitate CPD (Pfeiffer & Dunlap, 1982).

Supervision is mostly embraced with 'custodial orientation' in India as in many other countries. This orientation has been criticised for lacking sufficient training of supervisors (Smith, 2005), 'power struggle conflicts' among hierarchies (Yayli, 2008), and for the undefined responsibilities of the supervisors (Borko & Mayfield, 1995). It is usually related to inspection and control (Gordon, 1997), lack of collegiality, and negative feedback (Cooper, Ehrensal & Bromme, 2005). It represents supervision through rules, laws, and procedures, and supervisors as 'gatekeepers' for the profession where teachers are passive recipients of the recommendations (Smith, 2001; Cartaut & Bertone, 2009). Therefore, it has been defined as:

"...procedures and techniques for telling people what to do, for determining whether they are doing it, and for administering rewards and punishments" (McGregor, 1960, p.132).

Furthermore, supervision could be indirect and direct (Johnson, 1990; Mintzberg, 1979). Indirect supervision occurs through high-stakes testing to show good results when inspectors and principals ensure the performance of teachers to avoid being rated as low-performers (Goldring & Greenfield, 2002) whereas classroom observations can be used as spot checks for teachers in direct supervision (Johnson, 1990). Direct supervision is mostly undertaken as part of a job to draw up reports rather than helping teachers to grow

professionally (Cooper, Ehrensal & Bromme, 2005). On the whole, supervision has usually been taken as,

"...an intervention provided by a more senior member of a profession to a more junior member or members of that same profession. This relationship is evaluative and hierarchical..." (Bernard & Goodyear, 2009, p.7)

The overall concept of supervision appears to be to please the supervisor due to fear which constraints creativity (Ong'ondo & Borg, 2011). In Asian culture, especially, supervision is to do with 'custodial orientation' where the value of a person depends on the appraisal and perception of others who are in supervisory roles (Lau, Shaffer & Au, 2007; Liu *et al.*, 2009). In India, supervision is a top-down approach and aims to overview the classroom in order to evaluate the performance of teachers (FORTELL, 2011).

Supervision has been remained compatible with the centrally controlled Indian teacher-development system (Putnam & Borko, 2000). It especially embeds well with the government schools which are externally controlled by policy-makers with limited professional autonomy for teachers (Saigal, 2012). Such an approach to teacher-development has been criticised for being imposed on them by external experts to evaluate their progress later (NCTE, 1998; Dyer, 2000). It treats teachers as dictators to the students to deliver the received training with rare opportunities for reflections, growth and professional self-development (Rao, 1995; Mathew, 2007).

Sharma *et al.* (2011) researched with 100 teachers and other officials in 15 secondary schools from 3 Asian countries including India, Malaysia and Thailand for 3 years to investigate the nature of supervision through a qualitative method involving questionnaires and interviews. 92 teachers highlighted the lack of being involved in the process and showed a desire to be included along with principals, subject teachers and subject specialists to make supervision more meaningful. One of the three main concerns which emerged from that study is the need to involve teachers in the process because supervisors regarded "supervision as a platform to develop a sense of ownership for teachers and their professional growth and they are not at all benefited by the process. Instead it is done to punish, demoralize and insult teachers...rather than to improve their performances" (p.217). Those teachers believed the purpose of supervision to be punitive. They stressed that supervision was conducted ineffectively and was useless for them (N=97). However, the study does not mention the organisational sector of schools under target. Moreover, no cross-comparisons are made within a country or across countries. The fact that supervision

is hierarchical in nature is ignored and no alternative such as mentoring, which values the perceptions of teachers, are suggested for improvements.

Yet, the project is useful in order to understand that supervision affects the attitude of teachers towards self CPD and may force them to follow supervisors blindly without question to avoid negative experiences. Supervision has been under question to suppress the voices of teachers for a long time and is not an issue only in India. Blumberg (1980) in 'Supervision and Teachers: A Private Cold War' highlighted exasperation in teachers for their supervisors which in turn made the practice useless. Supervision was taken as an instrument to control the teachers and show positional power. Therefore, it was criticised as 'a waste of time' and for 'lacking trust in supervisors' by those teachers.

A study by Zepeda & Ponticell (1998) of 114 teachers in 2 states of the US to investigate what teachers demand and get from supervision through interviews found powerful supervisor ruling over the teachers and identified the worst five categories of it as "...(1) supervision as a dog and pony show, (2) supervision as a weapon, (3) supervision as a meaningless/invisible routine, (4) supervision as a fix-it list, and (5) supervision as an unwelcome intervention" (p.73). Nevertheless, the study has not suggested any reliable measure apart from post-supervision discussion to improve the situation.

The same authors in 2004 reported another qualitative research with 100 school teachers and their principals in the US and found that supervision was simply an evaluation for all participants. Principals understood their role to be to judge the teachers and gave suggestions to fulfil the steps required by law. Teachers also pointed out that principal misused their role as supervisor. In that situation, supervision found suppressing learning and mentoring was suggested as one of the recommendations to solve the problem. However, there is no thought as to how this could be initiated.

Moswela (2010) in a qualitative study among 699 participants from 233 secondary schools of Botswana also noticed wrong intentions among the supervisors (N=26). Those teachers also raised issues to get involved in the process (N=21). It was recommended to lower the hierarchical level between supervisor and teachers but how the practice itself can be improved and alternative options have not been elaborated on.

Consequently, it seems that many teachers reported supervision as a meaningless practice on various occasions which ended up with evaluation rather than providing support to promote CPD. The evaluation function is grounded in bureaucratic inspectional-type supervision (Sullivan & Glanz, 2000) which has also been embraced in India. Under such circumstances, Indian teachers who have made their own efforts towards CPD are not

satisfied with the benefits they have received (Kremer *et al.*, 2005; Pritchett & Murgai, 2007). This is so because there is no difference observed in the professional outcomes of hard working teachers and those who avoided responsibilities (Muralidharan, 2013). The reason to such observation is that the principal who performs evaluation is usually "engaged in administration [such] that he or she cannot devote time in monitoring, assessing and taking remedial measures for improving the quality of education being imparted" by teachers (Lahiri, 2011, p.57). The principal is too high up in the hierarchy to thoroughly assess the teachers and usually depends on close staff to give appropriate feedback. Such arrangements not only suppress the self-initiatives and voices of teachers which may promote their CPD but also affect their attitude to it.

Conversely, it has also been observed that permanent staff sometimes become offensive when the principal intrudes into a classroom without invitation for observations (Lahiri, 2011). It is usually acceptable in teaching practice that every teacher is doing something individually different and unexpected interventions could suppress their professional attitude (Chand, Choudhury, Joshi & Patel, 2011). However, this is not always the case. Sometimes, when teachers become aware about the inspections, they also act superficially to please the supervisors in order to get good ratings. Therefore, the process of supervision is often considered toothless by experts (e.g., Kremer *et al.*, 2005).

Also, the formative feedback of supervisory visits is taken to be less important because it mostly lacks implementation in the classroom. The evaluation techniques used since the pre-teaching stage, are usually outdated and traditional (Yadav, 2011). In the absence of detailed evaluation, teachers work for successful eventual assessments instead of reflecting on enhancing skills. It has also been noticed that supervisors (usually in government schools) monitor school conditions instead of teaching strategies (Dyer *et al.*, 2004). The present Indian system may be compared with the Cyprus system where the "Inspector continues to have the main responsibility for the inspection and evaluation of teachers after the end of the probationary period and until the teacher's retirement" instead of working towards CPD (Menon, 2012, p.220).

Such systems have been criticised for a number of reasons, such as lack of collegiality (Cooper, Ehrensal & Bromme, 2005), pop-in visits (Batteson, 1998), fear of supervisors (Farh, Cheng, Chou & Chu, 2006), evoking angry emotions (Wu, Hsu & Cheng, 2002), plastic-behaviour to please the supervisors, evaluative and directive feedback (Pellegrini & Scandura, 2008; Ong'ondo & Borg, 2011), subjective attitude to staff irrespective of any meaningful performance (Graen & Uhl-Bien, 1995), unprofessional or unethical

behaviour, and ineffective skills on the part of supervisors (Rous, 2004).

Therefore, Indian teachers seem de-motivated for CPD with supervision to the point that they "themselves say that unless supervisory arrangements are strengthened, they are unlikely to work harder" (Dyer *et al.*, 2004, p.49). Overall, it may be deduced that supervision is of less use and as it is called "super" vision" (Sullivan & Glanz, 2000, p.212), it seems no longer productive to promote the CPD of Indian teachers. Therefore, in order to promote their CPD a lot effort has been made in last few years and alternatives have been proposed such as facilitation of 'Diary writing' (Mathew, 2013), 'Teacher Development Groups' (Shivakumar, 2013), 'Social Writing' (Menon, 2013) and so on. One such endeavour is to adopt a 'formal mentoring program'. This attempt is the main focus in this study.

1.2.5 A Recent Attempt-Mentoring

The suggestion to adopt formal mentoring among Indian teachers has raised many issues to address (see section 1.3), especially because of the applied strategy so far. This is so because the previous attempts (MINDS, 2010; Ray, 2011; Kapur, 2013; Kumar, 2013) have not investigated the context for the presence and concept of 'informal mentoring' in practice but has simply assumed its absence and recommended the implementation of 'formal mentoring'.

For example, a pilot study MINDS (2010) was conducted in 11 schools in Delhi. This study was managed by UKIERI (UK-India Education and Research Initiative) with the collaboration of The Open University, UK and Delhi University, India. The project included an initial baseline study of the existing situation through a review of teacher education policies and commissions, and noticed an absence of the idea of formal mentoring. The contexts of schools were also explored but for CPD practices as a whole instead of examining the existence of 'formal' or 'informal' mentoring in praxis. Thereafter, a 'mentor-scheme' for a formal mentoring program was developed and tried with 88 teachers from four different subject areas in both government and private schools for a year in 2008-2009. Three types of schools were found with regard to formal mentoring and they were very effective, less supportive and non-starters.

However, the exact number of teachers and schools from each category are not mentioned and the 'type of school' is not related to the results categories which would have made the picture clearer. Moreover, the existing concept of informal mentoring has not taken into

account when formal mentoring scheme was planned. This may be the reason why that report shows that most teachers were continuously unclear about the concept of formal mentoring and took it as an extra task. Nevertheless, formal mentoring has been recommended promoting CPD of Indian teachers and its implementation has been put forward.

Similarly, Ray (2011) reports a pilot study for formal mentoring among 18 teacher-peers in English faculty from primary and secondary sectors of 5 schools in New Delhi and Noida for the period of 3 to 4 months. It was noticed that students of mentored teachers were more confident and interested in the class. The results also showed facilitation of CPD through mentoring. However, once more the pre-existing concept of 'informal mentoring' is not explored for this purpose. The organisational sector for the participating schools has not been considered and no proper planning is sought for. Yet, continuing with the formal mentoring has been suggested in other subject areas in those schools.

Kumar (2013) conducts neither a systematic research nor a pilot study. He participated in the MINDS (2010) scheme under the UKIERI project. He was greatly influenced by mentoring practice and has been promoting it through 'diary-writing' among 1000 teachers in different sessions which he arranges as a Master Trainer of SCERT while he himself is getting trained by the British Council. He used to get regular feedback from teachers and those teachers also find it equally fruitful. Such effort is appreciable but is not of much use in this project which deals with mentoring according to different perceptions (see glossary).

Kapur (2013) has conducted a systematic examination for formal mentoring among English teachers (N=56) from four government and private schools in NCR of India through a qualitative case-study approach which included focus-group discussions, indepth interviews and journal keeping. That study also assumed that informal mentoring is missing among teachers for 'information and experience sharing practices'. The participants were introduced to formal mentoring through a definition and were also familiarised with its process which was carried out for them for a period of 4 months. Later on formal mentoring was found to be positive in facilitating CPD, though teachers took it as an additional burden and other challenges in the context were noted. Moreover, the actual number of teachers who perceived formal mentoring to be positive is not mentioned. Nevertheless, adopting formal mentoring at policy and institutional levels has been suggested. It is worth noting that those teachers were not familiar with the term 'mentoring' and 'CPD' but responded to the queries regarding them when made familiar

through using definitions. Similar ideas are discussed later in this thesis with regard to mentoring.

The initiative to promote mentoring among Indian teachers is much needed as it has been found to be a positive experience globally. It is especially noteworthy when it has already been highlighted in previous research (e.g., Sharma *et al.*, 2011) that there is a need to transform CPD of teachers through supervision. However, such initiatives have triggered many questions that require thorough in-depth and prompt attention.

1.3 Mentoring and Indian System-Issues to Address

The above discussion highlights gaps in current knowledge for mentoring among Indian teachers. A thorough examination is required to ensure the link between theory and practice of mentoring among them before making further recommendations. Such attempts are needed to avoid the negative consequences that have been detailed earlier in section 1.1.8. The dimensions which need due in-depth and immediate attention are many but this research is inspired by the concerns discussed below.

1.3.1 The Vague Concept of Informal Mentoring and Familiarisation with Term

Literature shows that mentoring does not support a concrete definition with reference to confirming its existence in a context. Its concept is vague with 40 to 50 different definitions (Haggard *et al.*, 2011; Jones & Corner, 2012) which "come in all sizes, foci, and levels of inclusiveness" (Mertz, 2004, p.541). Therefore, the word 'mentoring' could mean different things to various people (Russell, 2007; Haggard *et al.*, 2011). Its concept varies from simply 'providing help once' to 'supporting someone thoroughly for a long period of time'. Such support is usually both professional and personal but contribution of each factor depends upon the extent of involvement in the relationship.

The contradictory issue around its definition causes confusion and makes it difficult to confirm its existence in a context while using different definitions. Merriam (1983, p.165) pointed out long ago "how mentoring is defined determines the extent of mentoring found" in a context. Therefore, there is contention for claiming that informal mentoring is missing among Indian teachers when explored through one particular definition.

Moreover, India has a collectivist culture and Indians prefer socialising with other people. Interactions occur between seniors and juniors naturally with a parental approach (Ramaswami & Dreher, 2010). The deep-rooted parental approach in India share many

similarities with informal mentoring which further strengthen the arguments against it from being missing among teachers. For example,

- 1. **Guidance and Nurture**: The concept of 'Guru-Shishya (teacher-student) heritage' which allows the seniors to be a teacher and philosophical guide to disciples to share knowledge places the seniors as a paternalistic figure to give guidance, nurture, and support to juniors (Pio, 2005; Pellegrini, Scandura & Jayaraman, 2010). This notion is similar to mentoring where "an intentional pairing of an inexperienced person with an experienced partner to guide and nurture his or her development" is promoted (Pitton, 2006, p.1).
- 2. **Father-like figure**: The effective organisational leaders have been characterised with a feature of 'caring like a parent' by Indian employees (House, Hanges, Javidan, Dorfman & Gupta, 2004; Chhokar, 2007) and mentor is also "a 'father' figure who sponsors, guides and instructs a younger individual who is known as a protégé" (Ehrich & Hansford, 1999, p.92).
- 3. **Reciprocity**: There is evidence that Indian organisations value the welfare of the employee and support reciprocal behaviour (Sparrow & Budhwar, 1997). In turn the employees also willingly reciprocate in caring and protecting the authoritative members. Mentoring also has elements of reciprocity, especially, as 'reverse mentoring' (Harvey & Buckley, 2002) where juniors mentor seniors. This feature is unique to mentoring as compared to supervision, coaching and tutoring where exchange of roles between the participants is impossible.
- 4. **Benevolence**: It has been identified that a benevolent guide is usually addressed by Indian employees who used to take care of their well-being (Kakar, Kakar, Kets-deVries, & Vrignaud, 2002). Benevolence is also a frequently highlighted characteristic of a good mentor (Leck & Wood, 2013)

The above evidence shows that Indians behave in ways which are consistent with the principles of mentoring. Apart from this, it is noticed that "India is higher on Hofstede's cultural dimension of collectivism" (Arora & Rangnekar, 2014, p.210) which fosters

mentoring automatically through belongingness, familiarity and relationships (Kram & Isabella, 1985; Ramaswami & Dreher, 2010).

Also, prior research (e.g., Sands, Parsons & Duane, 1991; Ostroff & Kozlowski, 1993; Aryee, Lo & Kang, 1999; Godshalk & Sosik, 2000; Haggard *et al.*, 2011) indicates that informal mentors work silently and they help the mentees even though they are not officially required to do so. Most researchers agree that it "is possible that these roles of the mentor may or may not be publicly recognized" in an organisation (e.g., Arifeen, 2010, p.223). Makanya (2004, p.i) confirmed this in two schools in South Africa through the qualitative case-study approach. Those teachers recognised "their H.O.Ds as mentors although it was not spelt out to them".

Similarly, Ramaswami & Dreher (2010) conducted a qualitative study in mentoring relationships through interviews among 29 MBA Indian students in the US who had 5 years of work-experience in India. They suggested that mentoring relationships in India would mostly be informal and such relationships are usually less visible, or in fact are not recognised as mentoring sometimes.

Arora & Rangnekar (2015, p.68) when collected data related to mentoring through a survey of 121 managers from different government and private Indian organisations highlighted that there was no formal mentoring scheme but the "Participants reported having been engaged in informal mentoring relationships without any organizational intervention". In addition, Samanvaya (2008, p.10) already reported the "suitability of the term 'teacher preparation' rather than mentoring, although mentoring is [sic] a part of it" when it was encouraged among alternative school teachers through a 'Teacher Mentoring Programme' in South India.

The informal mentoring relationships are often not articulated by the term 'mentoring'. The labels of 'mentor' or 'mentee' are rarely used by people involved in the process and they may not acknowledge the relationship as mentoring or sometimes do not know the term 'mentoring' though involved in it (Chao, 2009). Goodrich (2007) when investigated informal mentoring relationships among 17 participants in various roles in a US high school using ethnographic technique found that students knew the term 'mentoring' but recognised their 'mentoring actions' as "helping each other out" (p.111) instead of mentoring. Such misconceptions (although frequent) are not only confined to informal mentoring. Dobie, Smith & Robins (2010) in a study of formal mentoring among 29 physicians using a qualitative approach in the US illustrated that 3 respondents who described their role consistent to thematic categories of mentors but stated that their role

was not to mentor.

Moreover, a shift in concept of mentoring from an 'intense, exclusive, multiyear relationship' to 'a variety of short-term, low intensity interactions' (Pandey & Chhaila, 2014) may be an additional reason for its non-apparent observance.

Under such circumstances, it seems that informal mentoring has been silently exercised among Indian teachers without its official recognition and without being termed as 'mentoring'. There is a need to understand its hidden concept. Therefore, it is an unacceptable and arguable claim that the notion of informal mentoring is missing among them.

Hitherto, informal mentoring might have been assumed to be virtually missing among Indian teachers within the limit of a definition and without empirical evidence. However, there are possibilities of its existence in another guise because the concept of 'mentoring' is vague. The examination to 'informal mentoring' for its presence and underlined concept has either not been done prior to recommending 'formal mentoring' (e.g., MINDS, 2010) or if it is considered, the conclusions are usually derived under the impression of a particular definition (e.g., Kapur, 2013).

Similar is observed in research among other Indian professionals than teachers. For example, Arora & Rangnekar (2015) introduced the definition of mentoring while exploring the context for its existence. Such an approach has been criticised for substituting the perceptions of the participants (Haggard *et al.*, 2011) and imposing an alien concept of mentoring to them. This technique has already been reported causing confusion, especially, if mentoring is not officially announced in the context (Mertz, 2001; Mathews, 2003; Mertz, 2004; Bozeman & Feeney, 2007). Arora & Rangnekar (2014) used Noe's (1988) scale of mentoring-functions for this purpose but not explored the familiarisation with the term 'mentoring' without direct introduction.

Most importantly, it has been recommended that the existing informal mentoring concept would be more successfully used in designing formal mentoring program rather than adapting an external Western adopted version of it (e.g., Elliott, 1995). Consequently, there is a need of empirical investigation for the existence and contextual concept of informal mentoring among Indian teachers by exploring their experiences. It is also required to examine the level of familiarisation with the term 'mentoring' among them. Hence in order to scrutinise what mentoring means for Indian teachers the following questions have been raised:

- Q.1. How is informal mentoring conceptualised among Indian school teachers at present?

 AND
- Q.2. Do Indian teachers familiar with mentoring practice by its terminology?

1.3.2 The Affecting Demographic Factors

Relevant literature shows that the demographic factors of the participants such as age, sex, teaching-subject, work-experience etc. have been investigated in prior research in relation to CPD and to the extent of mentoring received (e.g., Thomas, 1993; Mullen & Lick, 1999; Finkelstein, Allen & Rhoton, 2003; Carver & Katz, 2004; Daresh, 2004; Stanulis & Floden, 2009; Foote, Brantlinger, Haydar, Smith & Gonzalez, 2011; Ganesan & Shalini, 2011; George & Mampilly, 2012). These factors have also been under examination in mentoring and teacher-development related research in India (Shobeiri, Omidvar & Prahallada, 2006; Joolideh & Yeshodhara, 2009; Divyanshi, 2012). Therefore, there are possibilities that such factors could affect the informal mentoring opportunities experienced by Indian teachers and can vary the outcomes with certain samples. Hence, the impact of such factors has been investigated in this project.

Finkelstein, Allen & Rhoton (2003) examined the role of age in mentoring relationships (either formal or informal) among 88 professional non-faculty employees in a university in the US through a mixed-methods approach. They found that age significantly affects the extent of received mentoring. A number of different patterns were observed (see the article for details). Ragins & McFarlin (1990) highlighted the significant impact of age and gender on mentoring experience while conducting a survey among 181 employees from 3 research and development organisations in the US. Young participants received more of certain mentoring functions.

Gender is also reported to be as one of the factors that have been investigated in relation to mentoring not only in other contexts (e.g., Noe, 1988; Darling, Hamilton, Toyokawa & Matsuda, 2002; Gormley, 2008; Shore, Toyokawa &Anderson, 2008; Weinberg & Lankau, 2011) but also in India (Ghosh & Haynes, 2008; Gupta & Gowda, 2012; Khan, 2013).

Work-experience of teachers has also been reported to have an impact on the degree of mentoring practised on many occasions (e.g., Long 2004; Beutel & Spooner-Lane, 2009; Menon, 2012). For example, in a mixed-methods examination of mentoring through various instruments among 84 teachers in the US by Spezzini, Austin, Abbott & Littleton

(2009) it was found that work-experience counts towards the extent of mentoring received by teachers.

Another factor which is under consideration in this regard is the teaching-subject (e.g., Lee & Feng, 2007). Cuckle & Clarke (2003) among 22 mentors and student-teachers in the UK through a qualitative study found that numeric subject teachers were more positive to CPD in the form of learning ICT than non-numeric subjects. Similarly, Seviour (2006) highlighted in her inspection report that was carried out on 29 trainee teachers from 8 schools in the UK that science teachers made more progress with mentors than other subject teachers including English, Mathematics, ICT, History, Geography, Modern Foreign Languages and Religious Education.

The demographic factors have also been found to have an impact on mentoring in professional sectors other than teaching in India. For example, Pandey & Chhaila (2014) analysed trends in mentoring relationships in the Indian IT sector (N=100) using multiple methods. They found 'work-experience', 'age' and 'gender' to affect the extent of mentoring received.

The effect of such factors has also been examined among Indian teachers but not in relation to mentoring so far. For example, Kapur (2013) found inversely varied responses to CPD with different 'age' and 'work-experience' groups of teachers. Joolideh & Yeshodhara (2009) when compared Indian and Iranian teachers (N=721) investigated the relation between 'organisational commitment' and, 'age' and 'teaching-subject' through questionnaire survey in both government and private schools. However, the results of that study revealed no such impact on the perception of Indian teachers.

Yet, looking at the above evidence, it is worth examining the impact of demographic factors on the extent of informal mentoring received by Indian teachers. Therefore, the following question has been posed:

Q.3. Do demographic variables affect the extent of informal mentoring received by Indian teachers?

1.3.3 Need of Modification and Preferences of Teachers

The contextual nature of mentoring (Kent, Kochan & Green, 2013) and the cultural differences between the West and Asian countries (Shank, 2005) emphasised this concern. Formal mentoring has been suggested to promote CPD of Indians as much as anywhere

else. There is no doubt that it has embedded well and remained more useful than supervision on many occasions in Western contexts (e.g., Paris & Gespass, 2001) which are less hierarchical as compared to the Asian culture. However, its success is not always assured and many researchers found it challenging in the Asian context (e.g., Ragins, Cotton & Miller, 2000; Bozionelos & Wang, 2006; Liu *et al.*, 2009).

So far, non-Western mentoring relationships have not been given much importance in the literature which makes it difficult "to locate any study of the benefits for mentors in an Asian cultural context" (Liu *et al.*, 2009, p.872). Mentoring is assumed to be compatible in the Asian context by some theorists (e.g., Chow, 2005; Hymowitz, 2005), but it is mostly the case when the findings of Western studies are generalised and used for non-Western samples (e.g., Bozionelos & Wang, 2006; Clutterbuck, 2007).

As there is scarcity of mentoring literature among Indian teachers, research from similar Asian contexts is considered to help develop understanding. It is apparent from literature that the 'Western concept of formal mentoring' needs revisiting for its compatibility with the 'organisational culture' of Asian workplaces such as India, Pakistan or China. The tailoring of its Western models for Asia has already been suggested. For example, the theoretical framework of Western models of 'collaborative teacher' through mentoring was reworked in Pakistani government schools (Mohammad & Harlech-Jones, 2008) in accordance with the training backgrounds and institutional conditions.

Mohammad & Harlech-Jones (2008) worked with 3 teachers through a qualitative casestudy approach on a program that was expected to initiate 'co-learning' between teachers and teacher-educators through mentoring. The designed program took into account the uneven distribution of power and lack of autonomy of teachers albeit the incompatibility between the 'principle of collaboration in mentoring' and 'inequalities of power distribution' in Pakistan affected the outcome. Therefore, it seems that the implementation of formal mentoring in Asia is not as simple as in the Western context where hierarchy is suppressed.

Arifeen (2010) highlighted a resistance for formal mentoring when investigated it among 207 managerial women through questionnaires in 3 cities of Pakistan. However, 67% participants felt the need for a mentor in order to progress in their career. The workplace environment of Pakistan is somewhat similar to the Indian context in terms of hierarchy (Jain & Venkata Ratnam, 1994).

Similarly, it has been observed in the Chinese context. For example, Lee & Feng (2007) with 16 teachers from 3 secondary schools in Guangzhou with regard to formal mentoring

through observations, interviews and document analysis highlighted that the senior mentor is not supposed to be questioned by the junior mentee in China because of the position of seniority. They have also noticed that the mentee teachers were not expected to bring a level of expertise for the mentors (Kerka, 1998; Shank, 2005) nor were the mentoring relationships free from conflicts and competitions among them as it used to be in Western countries. Such observations are in contrast to the process of 'transactional dialogic learning' in mentoring when the mentor teachers reflect on their own teaching to develop further and relationships are free from rivalry (Ballantyne, Hansford & Packer, 1995; Carter & Francis, 2001).

Wang, Strong & Odell (2004) compared the US with China in a case-study with 4 pairs of primary school mentor—mentee teachers for formal mentoring. They found US pairs with many opportunities to learn and were free to question each other without trouble whereas Chinese pairs had fewer chances to make progress and the sessions were dominated by mentors. Chinese mentors were more inclined to criticise the mentee and make direct suggestions. However, the unequal participation by Chinese teachers in the dialogue while mentoring had not affected the "constructive criticisms, reasonable compliments, and useful suggestions for their teaching" (Wang, Strong & Odell, 2004, p.808) and hence, formal mentoring was embraced among them.

Pryce *et al.* (2011) worked with 49 non-institutional participants in a qualitative study for formal mentoring among Indian youth and highlighted that the US model of one-to-one formal mentoring may not work in India due to its large population. However, the factor that seems most influential, i.e., hierarchy, was ignored.

The deep-rooted hierarchy in India may impede the outcome of formal mentoring because teachers may associate being mentored with professional incapability which shows that one needs help (Beans, 1999; Murray, 2001; Zellers, Howard & Barcic, 2008). There is a good chance that this may happen because the MINDS (2010) project itself suggested not using the label 'mentee' in future with Indian teachers to avoid conflict.

The above discussion shows that the Western model of formal mentoring needs to be revised in an Asian context to be useful. Nevertheless, the researchers (e.g., Liu *et al.*, 2009) show preference to it over supervision without investigating its incompatibilities in the Asian context. This may be due to the numerous reported benefits. Research has shown that mentoring is more productive than supervision but the importance of supervision can also not be ignored in Asian countries.

Supervision involves evaluative judgments and appraisals related to prestige, regard,

esteem, admiration, respect, and self-worth (Foa, 1971; Foa & Foa, 1974) and this type of career success is salient for Asian culture. This is so because individual values mostly depend on the appraisal and perception of the seniors (e.g., Lau, Shaffer & Au, 2007). In fact, Raabe & Beehr (2003) among 61 pairs from 2 companies related to the energy industry and high-technology in the US (where formal mentoring is prevalent) also observed such favouritism sometimes. They found supervisors more admirable than formal mentors and co-workers.

Moreover, mentoring literature has been listing 'lack of time' and 'increase in workload' as limitations to its success because it requires a lot of time, manpower, and devotion (Bozionelos, Bozionelos, Kostopoulos & Polychroniou, 2011) albeit with variations in formal and informal settings. Notwithstanding this, Indian teachers are already engaged in well-measured non-academic tasks (see section 1.2.3) along with routine classroom teaching and may not welcome more exertion from their end. This is because "it is doubtful whether enthusiasm and commitment will be maintained if it [mentoring] comes to be seen as unpaid over-time and a massively bureaucratic and time consuming habit" (Batteson, 1998, p.28).

Such incompatibility between mentoring and the context of the participants has already resulted in "Tor-mentors" (Alpert, Gardner & Tiukinhoy, 2003, p.12) in a number of incidences and has caused many problems. 'Tor-mentors' are defined as "senior faculty members who exploit or sabotage the careers of junior colleagues under the guise of mentoring" (Zellers, Howard & Barcic, 2008, p.561). Therefore, there is a need to investigate mentoring in India due to theoretical and methodological reasons because Indian and Western organisational culture differ in their hierarchical arrangements (House *et al.*, 2004; Pio, 2007).

Formal mentoring sometimes seems influential in Asian culture because it acts as a performance measure while simultaneously highlighting individual value (Ouchi, 1980). However, empirical evidence suggests that it may produce weak outcomes compared to Western societies because informal mentoring relationships are commonplace in Asia (Bozionelos & Wang, 2006; Liu *et al.*, 2009). Therefore, there are issues on the part of the stakeholders and those investing resources in terms of finance and manpower for designing and implementing formal mentoring programs in India if existing informal mentoring can be promoted with very little labour and resources.

Nevertheless, the success of mentoring, either formal or informal, has been determined by the willingness of the participants towards it (Darwin, 2000; Awaya et al., 2003; Cain,

2009; Pogodzinski, 2012). Researchers have been recommended exploring the preference of participants for mentoring because it demands time and effort (Kilburg, 2007), and the non-availability of such factors could result in negative consequences (e.g., Eby & Allen, 2002).

Nonetheless, India has a centralised and top-down approach to policies and teachers usually tend to accept decisions without question. There has been less space given to the will of the teachers with regard to decision-making while considering their CPD (Mooij, 2008; Nargund-Joshi, Rogers & Akerson, 2011). Imposing a rigid program that is drawn from policies at the central level or imported from outside could cause problems if formal mentoring is to be encouraged without the willingness of the teachers. Imposition may impede the CPD instead of enhancing experiences. It is also possible that Indian teachers may not prefer mentoring, either formal or informal, over supervision because of the present workload. Kapur (2013, p.102) has already shown that Indian teachers perceive mentoring as an "additional burden".

Conversely, formal mentoring has been found to be convenient in India in other workplaces. Chandrasekar (2012, p.5) examined it among 103 employees in an Indian business administration through a survey and concluded that "mentoring program improves the employee attitude in the organization". Similarly, Arora & Rangnekar (2014, p.210) emphasised "that in cultures like India, value-performance orientation—and, to a greater extent, mentoring— is viewed positively".

Yet, it cannot be denied that 'agreeableness' or 'willingness' or 'preference' towards mentoring is one of the major factors which facilitates it to draw benefits (Oglensky, 2008; Richard, Ismail, Bhuian & Taylor, 2009; Chun *et al.*, 2010; Weinberg & Lankau, 2011; Pogodzinski, 2012; Kochan *et al.*, 2015). Moreover, what must be taken into account is that the "vitality of all educational organizations lies in the willingness of teachers" (Joolideh & Yeshodhara, 2009, p.134). Therefore, it can be concluded that willing teachers will only be involved wholeheartedly to make such investments.

Research (e.g., Zeichner, 1995; Pryor, 1998; Rajuan, Beijaard & Verloop, 2007) has endorsed taking into account the beliefs of teachers to promote CPD. For example, a path analysis with 56 teachers from 13 schools in the US in relation to CPD concludes that "teachers' perception and beliefs about their own practice are the most significant predictors of individual change" (Smylie, 1988, p.23). The conjunction of "these values, their learning practices and their specific experiential contexts creates a powerful combination that determines decisions on teaching" (Singh, 2014, p.166).

Therefore, the exploration of the preferences of teachers could only provided a clearer picture towards the facilitation of mentoring in Indian schools. Mertz (2004, p.555) suggests that such investigations are necessary because "Not everyone is prepared to make this kind of commitment; not everyone possesses the abilities to realize the commitment" for mentoring. Therefore, it is needed to view the wider picture with regard to mentoring and examine its compatibility for Indian teachers before investing time, manpower and finances to develop 'formal mentoring programs'. This concern leads to the following questions:

Q.4. Are Indian school teachers satisfied with the present CPD practices or are they seeking a transformation?

AND

Q.5. What are the perceived preferences of Indian school teachers for supervision, formal mentoring and informal mentoring (or the combination of the two) to promote their CPD?

Additionally, prior research highlighted (e.g., PROBE, 1999; Singh, 2007) a difference between the attitude of teachers from government and private schools to CPD (see section 1.2.3). The MINDS (2010) project also found that government school teachers did not give a try to formal mentor-scheme. Therefore, it is requisite in this project to compare two types of schools for the posed research questions. Such comparisons were not considered in previous research (e.g., Kapur, 2013) in India.

1.4 Summary

This chapter has presented the reviewed literature along with the research questions. In the situation of scarcity of 'Indian mentoring literature', there was a need to adopt an appropriate method in this study. The need to compare preferences for the three practices (i.e., supervision, formal and informal mentoring) simultaneously triggered the requirement to generate specific research tools in this study because the accessed previous literature has not dealt with these issues. The next chapter now presents the methods employed and the strategies adopted in this project.

This chapter provides a context to this study and discusses the applied approach and design. Added to this, it explains the adopted strategies and the logic behind them to develop research tools. The generated research instruments have also been presented. This chapter also describes the pilot-phase and the sample. After this, the data collection and analysis procedures have been summarised. Lastly, the issues of credibility have been discussed along with the ethical concerns that such a study involves.

2.1 The Context

This research was conducted in Delhi (population of 14 million approximately) which is situated in the north of India and is its capital. This location was used because previous mentoring related investigations among Indian teachers were from the Delhi schools (e.g., MINDS, 2010; Kapur, 2013). It was also very fortunate that the author is a native of Delhi and is aware of the institutional framework of the system along with the necessary procedures required to conduct research in India.

Delhi comprises of two broad categories of schools, i.e., government and private. This research targeted six (3 government and 3 private) schools from the North-West zone of Delhi.

The particular zone of Delhi was approached because of the nearest available physical access to private schools. It was a coincidence that later on, the Department suggested approaching government schools located in the same area. The sharing of the same geographical location by both types of institutions was helpful. Each participating school is described later in section 2.8.

2.2 Research Approach

The pragmatic-approach which is described and advocated by various researchers (e.g., Tashakkori & Teddlie, 1998; Robson, 2002; Denscombe, 2008; Bryman, 2012; Morgan, 2014) was used in this study. This approach was chosen because the pragmatic response in the "new era" of method integration (Tashakkori & Creswell, 2007, p.3) helps to maximise understanding for a particular inquiry (Padgett, 2012).

The mixed-methods approach has been developed well and is a good method for integrating perspectives (Johnson, Onwuegbuzie & Turner, 2007). It not only provided a

combination of "the opportunities and challenges offered by different methods and analytical approaches" (Camfield, Crivello & Woodhead, 2009, p.9) but also increased data credibility through iteration and triangulation for different audiences in this project. The use of the pragmatic-approach here was influenced by the lack of independent completeness of either qualitative or quantitative views (Johnson & Onwuegbuzie, 2004; Morgan, 2007).

The quantitative approach is usually confined to extricating limited information without verbal clues whereas the qualitative approach can only include few respondents and is difficult to generalise. Moreover, the data from both of them are inherently related in a number of ways. For example, quantitative data are judged qualitatively and the qualitative data can be numerically explained (Wheeldon & Ahlberg, 2012). Over the last 40 years or so it has been noted by researchers that individual quantitative or qualitative research are not antithetical (Pinto, 2010), and in fact they complement each other.

This project gave importance to search for solutions to the research questions instead of being confined to a particular set of research assumptions and approaches. Therefore, the preference for either qualitative or quantitative paradigm did not seem sufficient because there are basic incompatibilities between them which have been under debate since the 1980s (Robson, 2002). The independent use of any one of them has often been criticised and considered as a limitation to the research (Cohen & Manion, 1994; Cohen, Manion & Morrison, 2007).

Comprehensive efforts were required to support research problems in this study (Wheeldon, 2010). Therefore, to achieve useful results it was essential to implement appropriate methods to address research problems in a meaningful way which suggested the use of a pragmatic-approach. This approach was employed with a belief that "combining research approaches produces a more complete and comprehensive picture of the topic" (Robson, 2011, p.167).

The pragmatic-approach embraces the use of 'mixed-methods' because it focuses not only on "what-works" (Robson, 2002, p.43) to solve the real world inquiries with appropriate explanations but also supports a coherent philosophy that extends beyond it (Morgan, 2014). However, there are few limitations to its use which cannot be ignored such as complicated designs, analysis and integration of the data (Creswell & Plano Clark, 2011). This approach includes logistical challenges to integrate both types of data (Tashakkori & Teddlie, 2010) and has been criticised sometimes to struggle for true co-ordination (Feilzer, 2010) along with a few other weaknesses (see Johnson & Onwuegbuzie, 2004 for

details). At the same time, it is widely used nowadays to provide many opportunities for choices, approaches and options for synergistic ends (Padgett, 2012) and is well accepted in pragmatic-paradigm in the "third methodological movement" (Creswell & Plano Clark, 2007, p.13).

To overcome the aforementioned potential drawbacks in this project, similar to other studies, data from different methods have been analysed separately and the results were then integrated to show common trends to present overall findings. The use of mixed-methods provided the opportunity to address the research questions through both, qualitative and quantitative, the traditional techniques (Denscombe, 2007; Creswell, 2009).

Moreover, it seemed demanding in this project to include the elements of both types of methods simultaneously because of the observed differences between,

- 1. The methods often used in educational research in India, and
- 2. The methods that have been advocated for the mentoring studies.

Zellers, Howard & Barcic (2008, p.582) highlighted that "because of the personal nature and meaning of mentoring, investigators should embrace qualitative research methods". According to them, qualitative methods could provide rich data for mentoring experiences. However, there was only one systematic qualitative examination of mentoring with Indian teachers available (Kapur, 2013) at the time of this study to make comparisons. The qualitative research in India has been less welcome because the interpretative paradigm seemed difficult to embed into teacher-development due to the prevalent top-down approach which assumes such engagement less important to provide a genuine contribution (Dyer *et al.*, 2002).

The quantitative methods usually dominated not only in Indian educational research (Raina, 2001; Dyer *et al.*, 2002; Khaparde, 2002; Singh, 2014) but were also available in mentoring related research in India among other professionals so far (e.g., Chandrasekar, 2012; Arora & Rangnekar, 2014; 2015). Yet, it seemed unsuitable to adopt a quantitative approach for this project because Ramaswami & Dreher (2010, p.505) suggested that it would be inappropriate to conduct "any quantitative examinations of mentoring in India because we do not have any substantial body of mentoring literature upon which to base relevant and testable hypotheses".

Therefore, the mixed-methods pragmatic-approach helped to collect both types of data for

triangulation (Denzin, 1978), to bring completeness and explain findings (Bryman, 2006) in this project. The mixed-methods here included the "inclusion of issues and strategies surrounding methods of data collection (e.g., questionnaires, interviews, observations)" (Johnson, Onwuegbuzie & Turner, 2007, p.118) and data analysis.

2.3 Research Design

This project was planned with a cross-sectional design which involved data collection and analysis at one specific point in time. Such design allowed adequate flexibility to prompt the data collection through various methods in the available time period. It provided an opportunity to get an insight to the context and to the behaviour of the participants with enough flexibility in terms of available resources to fit within the capacity of this research (USC, 2016).

Furthermore, it was important to consider the procedures to mix various methods. Creswell (2009) highlighted three procedures for this purpose, i.e., sequential¹, transformative² and concurrent. The concurrent procedures "in which the researcher converges or emerges quantitative and qualitative data in order to provide a comprehensive analysis of the research problem" (Creswell, 2009, p.14) was given priority here. Such procedures may reveal that the quantitative results do not necessarily confirm the qualitative findings or vice-versa (Tashakkori & Teddlie, 1998; Creswell, 2009). The possibilities of such outcomes are usually higher in the real world social research and hence, a concurrent procedure was employed in this project.

In such a procedure, ideally equal priority should be given to both, qualitative and quantitative, methods; however in practical terms more support can be given to anyone (Creswell, 2009). In this study, both methods were given equal priority and data were collected at the same time, and later integrated to present the overall results. This process helped to accept or reject the two different types of data for the same enquiry and acted as a "mean[s] to offset the weakness inherent within one method with the strength of another" (Creswell, 2009, p.213).

2.4 Research Strategy

This project was considered as "the initial research, which forms the basis of more conclusive research. Therefore, it can help in determining the research design, sampling

¹ Sequential procedures- The qualitative and quantitative data are collected one after another.

² Transformative procedures- They involve the use of theoretical lens as an overarching perspective in research.

methodology and data collection method" for future studies (Singh, 2007, p.64). The nature of inquiries was mostly descriptive and exploratory which "tends to tackle new problems on which little or no previous research has been done" (Brown, 2006, p.43). It was so because limited research on mentoring among Indian teachers was found through available sources.

Furthermore, while choosing an appropriate strategy it was necessary to look for the options which supported the use of qualitative and quantitative methods simultaneously and complementarily. For this purpose, the empirical exploratory strategies such as experiments, action-research, case-studies, phenomenological-studies, ethnographic-studies, grounded-theory studies and evaluation-studies (Denzin & Lincoln, 2005; Cohen, Manion & Morrison, 2007; Creswell, 2009; Merriam, 2009; Thomas, 2009; Robson, 2011) seemed either inappropriate or were incompatible within a doctoral study framework in terms of time, resources and monetary expectations.

Therefore, the design is supported with a multiple strategy for data collection through surveys, qualitative interviews and organisational documents. The mixed-methods approach with surveys and interviews has already been prevalent in social research (e.g., Bryman, 2012) and was not specifically proposed for the current project. The exploration of organisational documents was deliberately included because they were examined for existence of formal mentoring among Indian school teachers in previous research (e.g., MINDS, 2010). This method embedded well here because the adopted strategy facilitated the use of multiple methods for data collection (Robson, 2002).

Surveys provide "a quantitative or numeric description of trends, attitudes, or opinions" (Creswell, 2009, p.12) and address the issue comprehensively and in detail (Denscombe, 2007). They provide a wide and inclusive coverage within the decided time frame; hence, they could be longitudinal, cross-sectional and trend studies (Cohen, Manion & Morrison, 2007).

Longitudinal survey is conducted over an extended period of time to track the development of elements under consideration with the same sample and trend study focusing on the factors to examine rather than the people and using different samples at different time. Hence both were unsuitable for this research because of the time constraints and the interests of the researcher. Therefore, cross-sectional survey that provides a 'snapshot' of sample at a particular point of time was found appropriate.

An instrument that has been widely used for survey is the questionnaire (Ary, Jacobs, Sorensen & Razavieh, 2009; Robson, 2011) and this was employed here. But using

interviews to survey all of the teachers from the six schools was not feasible here. Additionally, a few qualitative interviews had already been planned in order to complement the survey.

An interview in a research has been defined as "a two-person conversation initiated by the interviewer for the specific purpose of obtaining research-relevant information" (Cannell & Kahn, 1968 quoted in Cohen & Manion, 1994, p.271). Therefore, the non-directive or informant interviews were inappropriate here because they were initiated and directed by the respondent instead of the researcher (Robson, 2011).

The group-interview seemed appropriate to generate a wider range of responses and in order to save time but at the same time it was possible that one person may dominate the interview, or one respondent might be reticent in front of others. Such interviews might inhibit the insights of the interviewees or might have highlighted individual-thinking over group-thinking (Cohen, Manion & Morrison, 2007). Such factors might have biased the data and affected the outcomes of this research; and therefore, were not used.

Structured and unstructured interviews also seemed less appropriate because they were less flexible with a very restrictive approach or too flexible, time consuming and informal with no boundaries to raise unexpected issues respectively. Subjects could consequently be easily distracted from the main subject of discussion in later case (Opie, 2004; Robson, 2011). Therefore, semi-structured interviews which have elements of both structured and unstructured interviews appeared appropriate in this project.

2.5 Research Methods

Current research included questionnaires to collect quantitative data and semi-structured interviews and organisational documents to collect qualitative data. The combination of interviews and questionnaires has been criticised sometimes for allowing less integration of data, non-alignment of responses in two methods by the same person and limits on the time provided for reflection (e.g., Pajares, 1992; Marton & Pong, 2005). It is noted that there may be a difference in the responses of a participant to the same inquiry in these two methods because deeper insights are triggered through the interviews while wider and dispassionate responses were noticed in the questionnaires (Oei & Zwart, 1986).

In spite of such a weakness, the combination of these two methods is worthy to obtain direct responses in empirical mixed-methods research because they supplement each other "in a number of cases, as indicated by the exact agreement rates, participant interview data

accurately reflected their responses on the questionnaire" (Harris & Brown, 2010, p.8). Similar responses are usually observed from both methods for an inquiry. Moreover, the guidelines from the literature to minimise such obstacles were applied here which suggested achieving the greatest level of agreement between the designed items of the two methods.

The combination of these two methods was not unique to this study because the mixed-method research often used questionnaires and interviews together while investigating in an educational field (e.g., Brookhart & Durkin, 2003; Lai & Waltman, 2008). In this project, similar to other studies, the questionnaires highlighted the patterns amongst large populations and the interviews collected more in-depth insights of the attitudes, thoughts, and actions from few of the participants (Kendall, 2008; Creswell, 2009; Yin, 2012).

2.5.1 Questionnaires

Questionnaires are a useful way to gather data on experiences, attitudes and preferences of the participants (Cohen, Manion & Morrison, 2007). Therefore, they were appropriate to this research which set out to explore the context and collect the perceived preferences of teachers. They have also been evidenced as a widely used method in previous educational research in India (e.g., Raina, 2001).

They provided wide and inclusive coverage within the prescribed time-frame (Cohen, Manion & Morrison, 2007; Denscombe, 2007) which was required in this project. The simultaneous approach to 6 schools paved the way for an appropriate questionnaire in terms of the variation in the sample to explore several possible aspects and to compare different schools and two types of schools.

— Mode of Execution

The questionnaire responses could be collected by post, telephone, e-mail, self or group-administration (Ary *et al.*, 2009; Robson, 2011; Bryman, 2012). The collection through post and e-mail were ruled out as they usually resulted in a low response-rate. Using the telephone was also not feasible due to non-availability of the contact details of each participant because of school policies. The suggested way to improve the response-rate is delivering the questionnaire personally (Cohen, Manion & Morrison, 2007). Hence, self and group administrations which usually fulfil this requirement were employed.

Self-administration facilitated the response-rate which is otherwise usually recognised as

one of the weaker aspect of using questionnaires. In such administration, questionnaires might be filled in the absence of or the presence of the researcher. In this research, questionnaires were handed out to specific persons in the schools who gave them to the teachers. Afterwards, teachers returned them back to the same person anonymously when completed through a drop-box (Wilkinson & Birmingham, 2003). Later, the filled questionnaires were collected from the 'contact person' as previously arranged.

Group-administration is less flexible as compared to self-administration but also ensures a good response-rate in a short period of time. This method was employed in a private school to save the time of the participating teachers when the concern was raised by the school management.

Furthermore, it is worth noting that the questionnaire data could be collected from the individuals for the organisation while the organisation acted as a unit of study rather than individual participants (Robson, 2011). Consequently, the data were collected from the teachers for the schools that represented the units of study in this research.

— Style of the Questionnaire

The structured close-ended questionnaires were used because they helped to compare the groups in a sample (Oppenheim, 1992; Cohen, Manion & Morrison, 2007). Out of the various types of closed-questions such as dichotomous, multiple-choice, rank-order, rating-scale, constant-sum, matrix, and scales such as the Likert scale and sematic differential, the usual suggested one for measuring attitude, belief and preferences has been the Likert scale (Thomas, 2009; Lovelace & Brickman, 2013). Hence, the Likert scale was of advantage here because the status quo in the schools and the preferences of the teachers to the CPD practices were required to be examined.

Another important reason to choose the Likert scale was the similarity between the nature of data that can be explored through it and nature of enquiry. The developed continuum in section 2.6.2 later shows that there are common features between supervision, formal and informal mentoring. These practices can be ordered on continuum according to the variation in extent of considered features but it is usually not easy to draw clear distinction lines between their scopes. The type of data that can be collected through the Likert scale is ordinal in nature which means "Data in which an ordering or ranking of responses is possible but no measure of distance is possible" (Allen & Seaman, 2007, n.p.).

This research included generating a new questionnaire instead of merely using an existing

instrument. The rationale and style of its development have been explained later in section 2.6 and the designed questionnaire is introduced in section 2.7. The questionnaire was also scrutinised initially in the pilot-phase which is discussed in section 2.9.

2.5.2 Semi-Structured Interviews

Semi-structured interviews here complemented the questionnaires to overcome their inherited problems, i.e., being too standardised and focused. However, the data from the interviews are also not neutral and are usually affected by personal interactions and context (Fontana & Frey, 2000; Lankshear & Knobel, 2004; Silverman, 2006). Such data are also difficult to replicate and generalise because of the small number of participants (Bryman, 2012). Yet, such interviews provided an opportunity "to elicit from the interviewee...all manner of information: interviewees' own behaviour or that of others; attitudes; norms; beliefs; and values" (Bryman, 2012, p.209) in this project similar to other previous studies.

Such interviews may also include the prejudice of the researcher; nevertheless, they are widely used in multi-strategy designs (especially in the mixed-methods studies) and were well suited to this research. They consolidate the features of both, the structured and the unstructured interviews, by providing flexibility and by being focused at the same time (Thomas, 2009). They seemed appropriate here because the issues to address were not on the list of questions like they used to be in the structured interviews but they were the 'aide-memoire' of those themes.

Such interviews incorporated the freedom to follow as well as addressed the issues at the same time. They provided flexibility to the interviewees to express themselves freely while the process was facilitated by using prompts, nudes, probes and follow-up questions to obtain clarification or to discuss issues that had been undisclosed till now and needed to be examined further.

One potential bias of using interviews, especially in a mixed-method research, is to be deviated from the main themes and the effects of the researcher. Such impacts were minimised by using prompts that were quite similar to the questionnaire items to gain consistency in the results (Harris & Brown, 2010).

— Mode of Execution and Records

Interviews could be conducted on the telephone, online or face-to-face. The drawbacks of

the telephone and online interviews are the lack of non-verbal cues and the lack of possibility to gather contextual information respectively (Robson, 2011). Hence, they were excluded in this project. 'Face-to-face' interviews were employed which could be either recorded or hand-written. Recording was preferred over taking hand-written notes because it allowed having long-lasting records and concentrating on the process while interviewing rather than taking notes in a rush (Denscombe, 2007). However, hand-written notes were also taken in the government schools because recording of the interviews was not permitted due to the departmental policy and also with an interviewee from a private school from personal choice.

The considered interview questions were parallel to the generated questionnaire items and gathered qualitative data to corroborate with the quantitative data from the questionnaires. Moreover, the additional information (either contradictory or supporting) to the questionnaires was collected in this way. Later on, this information has also been used to understand the reasoning behind the results. The foci of generated interview questions have been discussed later in sections 2.6 and 2.7.

2.5.3 Organisational Documents

This method has been included here because previous research claimed that the notion of formal mentoring is missing among Indian school teachers based on document analysis (e.g., MINDS, 2010). However, this method was not so helpful in extricating the desired information in this study because the documents relating to CPD practices were shared by two private schools only.

In mixed-methods research there may be a set of data which could not be of specific use. Feilzer (2010, p.14) suggested that "Researchers have to be aware from the outset that the data collated as part of research may not "fit" the research question...that was not considered at the design stage" in mixed-methods study. Moreover, the documents were used as a subsidiary source rather than the main approach here because Cohen, Manion & Morrison (2007, p.201) identified that documents "may be highly biased and selective, as they were not intended to be regarded as research data but were written for a different purpose, audience and context".

The nature of collected documents here did not strengthen the research and was of less importance. Nevertheless, this method embedded well in this project because documents can be analysed quantitatively or qualitatively (Thomas, 2009). Such access supported the

employment of new methods wherever possible to enhance understanding and to get insights from a different angle.

Overall

The collection of multiple data with QUAN+QUAL technique added potential to this research and strengthened the grounds for data analysis, drawing conclusions and discussion around the results.

2.6 The Rationale and Procedures to Generate Research Instruments

The research instruments were developed in this research through the analysis of literature instead of using the existing tools due to the two reasons which are discussed below. The use of self-developed instruments for measuring the professional attitude of the teachers in India (e.g., Singh, 2014) or elsewhere was not unique to this study.

Rationale:

Firstly: The literature (e.g., Haggard *et al.*, 2011) evidenced either providing a definition and then asking whether having a mentor (e.g., Baugh, Lankau & Scandura, 1996), or the 'mentoring functions received' (e.g., Burke & McKeen, 1997) by the participants acted as indicators to confirm its existence. The functions included 'a series of actions or behaviours' that mentoring involves. The existence of such actions and behaviours among the participants confirmed the presence of mentoring (e.g., Noe, 1988; Arora & Rangnekar, 2014).

Initially, it was thought using the definition of mentoring provided by Bozeman & Feeney (2007) here because it seemed to convey the concept better (see section 1.1.2). However, this opinion was abandoned because according to them this definition is not applicable to both types of mentoring, i.e., formal and informal, which have been considered here.

Moreover, using a particular definition of mentoring, when many different ones existed, may have affected the outcomes (Merriam, 1983; Bozeman & Feeney, 2007). Haggard *et al.* (2011, p.281) state that "researchers often provide a definition of mentoring in an attempt to reduce variability among study participants in their conceptualization of a mentor and/or mentoring relationships". Such an approach has been criticised for substituting the perceptions of the participants. However, when no definition is given "participants (protégés and/or mentors) must rely on their own schema of what a mentor

is, with the result that many different kinds of relationships and arrangements may be included in the study" (Haggard *et al.*, 2011, p.281).

Therefore, in a situation of dilemma for 'What is mentoring?' and to minimise the effects of definitional conflicts of mentoring, the alternate route which was to measure the 'received mentoring functions' was chosen for this project. This technique has been successfully employed by other researchers (e.g., Goodwin, Stevens & Bellamy, 1998; Awaya *et al.*, 2003). There are mixed opinions on the categories of functions of mentoring to be considered (Tepper, Shaffer & Tepper, 1996; Scandura & Williams, 2001) and most of the existing tools focused on eliciting the perspectives of the mentees only.

Hence, the use of a self-developed instrument seemed a better option to include necessary functions and to get the viewpoints of the mentors as well. Such efforts were also requisite in overcoming the expected drawbacks of previous research in India which provided a definition of mentoring (e.g., Kapur, 2013, Arora & Rangnekar, 2015).

Secondly: No previous studies emerged from accessed literature that employed research tools to compare the three practices (i.e., formal mentoring, informal mentoring and supervision) simultaneously. Hence, the unavailability of the required tools forced research instruments to be generated. Previous research compared formal mentoring with informal mentoring (e.g., Chao, Walz & Gardner, 1992; Eby & Allen, 2002; Sosik, Lee & Bouquillon, 2005), and mentoring with supervision (e.g., Raabe & Beehr, 2003); however, a combined comparison for all three was not found in the literature explored.

Moreover, it was necessary to understand various distinctions among three practices, especially, when previous literature (e.g., Tonidandel, Avery & Phillips, 2007; Crasborn *et al.*, 2008) mixed their concepts. It appeared that such confusion was one of the reasons to negative impact on the relationships while exercising the aforesaid practices. Therefore, a continuum of the 'common features' of the three practices was developed to distinguish them from each other though they had coinciding characteristics (see section 2.6.2). Such a distinction was required to explore the perceived preferences of the teachers for them.

The relevant literature was analysed with a neutral perspective to develop the instruments. Section 2.6.1 now discusses the developed concept of mentoring to explore its existence among participating teachers. It also elaborates on the Likert items to investigate the level of satisfaction with present CPD practices and familiarity with the term 'mentoring'. Thereafter, section 2.6.2 explains the designed continuum for the three practices to explore

the perceived preferences of Indian teachers for them. Based on these sub-sections, research instruments were developed and have been discussed in section 2.7.

2.6.1 The Concept of Mentoring Herein and Level of Satisfaction

The three traditional kinds of pre-prepared measures of 'received mentoring functions' in literature are 'Mentoring Role Instrument' (e.g., Ragins & McFarlin, 1990; Ragins & Cotton, 1999), 'Mentoring Functions Scale' (e.g., Noe, 1988), and 'Mentoring Functions Questionnaire' (e.g., Scandura & Ragins, 1993). Some researchers (e.g., Scandura, 1992) have supported the three mentoring functions which are professional, personal and role modelling; however, others have classified 'role modelling' either as a personal function or have totally excluded it (e.g., Kram, 1985; Fagenson, 1992; Day & Allen, 2004; Luecke, 2004; McCauley & Van Velsor, 2004). There is also a negligible acceptance of the notion that a personal connection is not necessary for mentoring (e.g., Whiting & Janasz, 2004).

Nevertheless, acceptance of the two functions of mentoring, i.e., professional and personal, is widespread (e.g., Kram, 1985; Wanberg, Welsh & Hezlett, 2003; Hezlett, 2005; Weinberg & Lankau, 2011; Huizing, 2012). The professional-functions promote 'career-development' (Tenenbaum, Crosby & Gliner, 2001; Buyukgoze-Kavas *et al.*, 2010) while the personal-functions facilitate 'psychological-development'. Moreover, based on the indication by Ramaswami & Dreher (2010) that behaviours of Indian mentors may be similar to those of Western categories which usually includes two broad functions of mentoring, i.e., personal and professional, it was decided to include only these two functions in this study.

Therefore, the repeatedly reported sub-functions in the two main functional categories (i.e., professional and personal) of mentoring have been included. Table 2.1 below highlights the sub-functions which helped to develop the 13 statements in section-2 of the questionnaire and Q.1 to Q.4 in the interviews. The frequency to receive the mentioned functions was collected through Likert scale to investigate the existence and concept of informal mentoring in support of the first research question. The same results were related to demographic factors for the third question.

Another considered aspect is the belief that mentoring is a **'two-way'** practice, i.e., both the mentor and mentee receive mentoring functions (Healy & Welchert, 1990; Ehrich, Hansford & Tennent, 2004; Hezlett, 2005; Maistre & Pare, 2010; Jones & Brown, 2011),

instead of 'one-way', i.e., only mentees receive them, (Haggard *et al.*, 2011), as it was assumed in the earlier research.

The willingness and commitment of both partners can only facilitate successful mentoring (Avalos, 2011; George & Mampilly, 2012). Mentoring gives an opportunity to be a mentor and mentee simultaneously by offering and gaining knowledge (Mcguire & Reger, 2003;

Table 2.1 Functions of Mentoring

	Help in planning to achieve the set targets (Hazan, Gur-Yaish &					
	Campa, 2004; Spezzini et al., 2009).					
	Providing assistance in learning (Fowler & O'Gorman, 2005;					
	Dobie, Smith & Robins, 2010; Flores, Hernandez, García & Claeys,					
	2011).					
	Providing advice for career related matters (Gordon, 1997; Ali &					
Professional	Panther, 2008; Lidenberger, 2008; Crone, 2011; Huizing, 2012).					
Functions	Receiving continuous feedback on progress (Tonidandel, Avery &					
	Phillips, 2007; Dobie, Smith & Robins, 2010).					
	Help in reflection to enhance self-development (Jones, Nettleton,					
	Smith, Brown, Chapman & Morgan, 2005; Lord, Atkinson &					
	Mitchell, 2008; Cain, 2009; Gordon & Brobeck, 2010).					
	Providing long-term professional support (Mertz, 2004; Callan,					
	2006; Gormley, 2008).					
	Providing genuine care as a person (Feeney & Collins, 2004;					
Personal	Gormley, 2008).					
Functions	Support and encouragement in difficult times (Awaya et al., 2003					
	Hobson & Sharp, 2005; Lord, Atkinson & Mitchell, 2008; Flores et					
	al., 2011).					

Chun *et al.*, 2010). Interestingly, Ramaswami & Dreher (2010, p.522) suggested that, though hierarchy dominates in India, respondents in that study seemed "to want to break away from a traditional paternalistic style of mentoring to a more egalitarian, two-way approach". Arora & Rangnekar (2014) also stressed the need to understand the perspectives of mentor apart from the mentee in India because very few studies have

examined the willingness to mentor (e.g., Niehoff, 2006). Moreover, it has been endorsed sometimes that the mentor should be more senior than the mentee for successful mentoring (Haggard *et al.*, 2011; Ghosh, 2014). Therefore, it was important to explore the perspectives of seniors, especially as mentees.

For this purpose, the designed questionnaire items have allowed teachers to represent both, i.e., 'mentor' and 'mentee', viewpoints for the 5 functions of mentoring, out of 8. For example, the items to explore the existence of professional-function of mentoring- 'Help in planning' were:

S.no.	Statement	1	2	3	4	5
1.	I have a colleague who helps me in the					
	planning of my work.					
2.	I often help my colleague to plan his/her					
	work.					

Another function related to the 'involvement in long-term relationship' was designed alternatively without such a requirement. The items for the remaining two functions (1 professional and 1 personal) were designed only one-way to keep the questionnaire brief and comprehensive. Consistent with previous research (e.g., Spezzini *et al.*, 2009) the term 'mentor' was not used in the initial 13 statements while the involvement in functions of mentoring was measured. The same section in the questionnaire also included the items to investigate familiarity with the term 'mentoring' and the level of satisfaction with present CPD practices in support of the second and fourth research questions respectively. The level of contentment with present CPD practices was measured through the statement 'I feel happy and satisfied about my professional development with the use of current practices in the school.'

Another Likert item targeted to explore the familiarity with the term 'mentoring'. Teachers were asked to choose an option on the Likert scale from 1=Never to 6=Always for the statement 'I understand the concept of mentoring' for this purpose. The intention was to measure the level of recognition with the term 'mentoring' through this item whereas the existing concept among the teachers was explored through the aforementioned 13 statements in the same section. The scale was labelled in this particular way keeping in mind the fact that mentoring has various definitions which vary in conveying its concept and different people may perceive it differently (Mertz, 2004). Literature shows that it depends on the person to either 'never' understand the concept of mentoring which is

diverse or 'always' grasp the intent. Hence it was inferred through available literature that the teachers, who would be familiar with the mentoring process through its known term, i.e., mentoring, would respond more towards the right-hand points on the Likert scale. Such presumption was thought applicable to both the situations where teachers would relate the term 'mentoring' to the above 13 statements which included its concept through various functions or think otherwise. Interview Q.5 also targeted the same query.

2.6.2 A Continuum of the Comparative Features for the Three CPD Practices

The idea to develop a continuum for the common features of the three practices (i.e., supervision, formal mentoring and informal mentoring) was derived from a notion that was initially suggested by Shapiro, Haseltine & Rowe (1978) and since then has been found to be prevalent. They represented the 'level of involvement in different relationships' (including 'role models' and 'mentors') on a continuum because there are no apparent distinction lines in such relationships for the extent of various common features; however, the extremes are distinguishable. This technique has already been employed by many other researchers since then (e.g., Hurley, 1988; Holland, 1998; Mertz, 2004; Barkley, 2013; Johnson, 2014; Johnson, Skinner & Kaslow, 2014; Nesta, 2015). For example, Mertz (2004) placed mentors at the top-level of 'involvement in a relationship' while comparing them to other similar characters such as role-models, coaches, counsellors and sponsors with the use of a continuum because it is not easy to draw explicit distinction lines among them due to some common features.

This study required the comparison of supervision, formal mentoring and informal mentoring in order to extricate the preference of the teachers for a particular one. The aforesaid three practices have common features which vary in degree among them to be ordered but marking clear boundaries is not straightforward. Hence, the continuum that is "a continuous sequence in which adjacent elements are not perceptibly different from each other, but the extremes are quite distinct" (OUP, 2016, n.p.) represented the three practices appropriately.

Therefore, a continuum was developed because the "supervisory behaviours could not be distinguished from purely mentoring behaviors" (e.g., Raabe & Beehr, 2003, p.287). The literature shows that mentoring usually either requires similar tasks more frequently or needs additional tasks than supervision carries out (e.g., Raabe & Beehr, 2003). Ostroff & Kozlowski (1993) conclude that supervisors could behave like mentors by adding mentor-

like activities. Paris & Gespass (2001) who have stressed on 'working-together' rather than supervising the teachers, somehow also ended up relating their actions to the mentoring.

However, the facts which are nearly always universally agreed on, such as "*mentoring* goes far beyond supervision" (e.g., Fletcher, 2000, p.8) and one should not be a good supervisor to be a good mentor (e.g., Hezlett, 2005), places both the practices at the opposite ends of a continuum. Formal and Informal mentoring also have a continuum between them for the 'involvement in relationships' (Long, McKenzie-Robblee, Schaefer, Steeves, Wnuk, Pinnegar & Clandinin, 2012) and exercising style (e.g., Angelique, Kyle & Taylor, 2002; Cawyer, Simonds & Davis, 2002; Zellers, Howard & Barcic, 2008).

Overall, CPD practices have been compared along a continuum and have not only been suggested in this project. Literature analysis with regard to the features of supervision and, formal and informal mentoring helped to develop a continuum. Many features could have included but the "features of PD worth testing" (Wayne, Yoon, Zhu, Cronen & Garet, 2008, p.472) were considered.

In total, ten features which have been discussed below and summed up in Table 2.2 were involved to generate a research instrument in support of the fifth research question. On the basis of the variation observed in a particular feature, the three practices were placed along the continuum and the Likert in Section-3 of the questionnaire. Hence, the order of place of the three practices varied for the different features. The interview questions from 6 to 8 were developed in accordance to this. The logic behind the applied procedures has also been detailed below.

- **1. Solemnity and type of evaluation** (Sullivan & Glanz, 2000; Löfstrom & Eisenschmidt, 2009) was considered because in "the Indian system, the term "evaluation" is associated with examinations [resulting in] stress and anxiety" (NCERT, 2005, p.71) which could affect the attitude of teachers.
- Supervisors are usually assumed to be like examiners providing an 'overview' of progress (e.g., Rous, 2004) in terms of what teachers have done 'right or wrong' and telling them 'what to do next time'. They hold evaluative power (Ascher & Butler, 2010), and the provided feedback is mostly appraising and a directive to focus on general pedagogy which is deemed to be important for documenting purposes (Paris & Gespass, 2001; Ong'ondo & Borg, 2011). Such feedback used to have written details (Ascher & Butler, 2010) but is usually produced in a 'single-class session visit'

Table 2.2 Comparative Continuum of CPD Practices

		Place along continuum						
S.no.	Feature	•		-				
1.	Solemnity and type of evaluation.	Informal mentoring	Supervision	Formal mentoring				
	Consumption of time and burden of							
2.	workload.	Supervision	Informal mentoring	Formal mentoring				
	Interference in and criticism of work by							
3.	another colleague.	Supervision	Informal mentoring	Formal mentoring				
4.	Frequency of interactions.	Supervision	Informal mentoring	Formal mentoring				
	Commitment towards taking responsibility of							
5.	another colleague.	Supervision	Informal mentoring	Formal mentoring				
6.	Trust in another colleague.	Supervision	Formal mentoring	Informal mentoring				
7.	Intensity of information sharing.	Supervision	Formal mentoring	Informal mentoring				
8.	Reciprocity.	Supervision	Formal mentoring	Informal mentoring				
9.	Length of contact.	Supervision	Formal mentoring	Informal mentoring				
	Priority given to organisations to choose							
10.	partner.	Informal Mentoring	Formal mentoring	Supervision				

in an annual to quarterly basis (Fenwick, 2001; Paris & Gespass, 2001).

- Informal mentors do not have "absolutes in classroom judgement; a teacher's most appropriate response in any situation is always open to professional dialogue with others" (Sixsmith & Simco, 2006, p.11). Therefore, evaluation is usually considered as an impediment to be a true informal mentor (Dobie, Smith & Robins, 2010). Informal mentoring has been embraced as an easy-going, non-judgmental, dialogical, non-evaluative practice (Mullen, 2005; Lee & Feng, 2007; Lord, Atkinson & Mitchell, 2008; Knight, 2009). It is the mentee who has the choice to make use of the free assistance offered (Oglensky, 2008). The feedback provided includes a natural desire to seek guidance whenever required and is usually verbal.
- Formal mentors do such in-depth and frequent evaluation that "in most cases, there is an unavoidable conflict of interest in being an evaluator and a mentor" (Zellers, Howard & Barcic, 2008, p.565). It has been found difficult to convince mentees that they are resources to help and not evaluators or judges (Ganser, 1995). The formal mentor also sometimes is conscious of being used as a tool for evaluation by the administration (Ganser, 1995). Therefore, their status is questioned sometimes for artificial collaboration (Dobie, Smith & Robins, 2010). They usually serve the purpose of "Increased evaluation interest" (Morzinski & Fisher, 1996, p.44) for the organisation through frequent feedback (Huizing, 2012). Regular feedback help to promote "teacher self-direction while potentially undercutting professional empowerment through increased surveillance" (Fenwick, 2001, p.410). Feedback is usually in written through pre-designed specified forms (Long et al., 2012).

From the above discussion, an order was recognised on the continuum in Table 2.2 for this feature and the following 3 Likert items were developed to explore the preferences of teachers to it from 1=least preferred to 6=most preferred:

	Statements	1	2	3	4	5	6
1.	Written feedback of your overall performance by a						
	colleague.						
2.	Brief and direct evaluation of your teaching practice by						
	a colleague.						
3.	Frequent and continuous evaluation of your progress.						
		_			$\sqrt{}$	$\overline{\ }$	
		Info	mal	Super	vision	Forn	nal
		Men	Mentoring			Mento	oring

- 2. Time consumption and burden of workload was included because Lord, Atkinson & Mitchell (2008) highlighted the need to 'develop time-management skills' and to 'undercut the unrealistic demands from teachers' while proposing mentoring in India.
- **Supervision** includes less frequent meetings with feedback as 'overview and oversight' (Fenwick, 2001), and hence, uses up less time and helps in reducing workload on participants.
- Informal mentoring is often an extra task in addition to the primary workload (Barnett, 2008), and hence, requires more time and energy (Allen, Lentz & Eby, 2006). It adds extra work to the daily routines (Perunka & Erkkilä, 2012). The 'Erickson's concept of generativity' highlighted the fact that effective mentoring needed most of the energy of the participants which directly correlates to the 'time spent together' (Erickson, 1963; NFIE, 1999; Kilburg, 2007; Weinberg & Lankau, 2011). However, its informal nature does provide flexibility for inputs.
- Formal mentoring demands more time and effort as compared to informal mentoring because it involves more frequent meetings and feedback (Raabe & Beehr, 2003). Darwin (2000, p.204) noticed that even in optimal conditions "formal programs place heavy burdens on human resources" because they are controlled by organisations and the effort need to be made more obvious. Therefore, formal mentors usually complain that they have barely enough time to complete professional duties and often need to do additional hours of work (Ganser, 1995; Barnett, 2008; Maistre & Pare, 2010). Lack of time is one of the two frequently cited problems associated with formal mentoring (Ackley & Gall, 1992; Ehrich, Hansford & Tennent, 2004; Huizing, 2012).

The following two Likert items represented this feature and practices showed the below order:

	Statements	1	2	3	4	5	6
1.	Spend more time on your professional development.						
2.	Increase in workload by involving in professional development practices.						
						Υ	
		Supervision		Info		Forr	
				Ment	oring	Mento	ring

3. Positive criticism of/Interventions in the working style or "critical colleagueship" (Desimone, 2009, p.185) was given attention because it could be "related to the

cultural context where frequent monitoring means awkward intervention and being too formal" (Lee & Feng, 2007, p.257). The Indian system is colonial and abuse has already been recognised as a part of it (e.g., Samanvaya, 2008). In such circumstances, positive constructive criticism while mentoring (Darling *et al.*, 2002) seems less acceptable in India.

• **Supervision** has usually been associated with criticism, negativity and intervention (Madlock & Kennedy-Lightsay, 2010). Ong'ondo & Borg (2011, p.522) noticed that teachers usually made special preparations to please their supervisors on being aware of supervisory visits and hence "did not have any scaffolded [sic] opportunities to critically interrogate and reflect on their own practices".

The supervisees who do not want to appear unknowledgeable are usually not willing to accept criticism positively, and due to fear and disappointment perceive it negatively (Ostroff & Kozlowski, 1993; Rous, 2004). Therefore, supervision seems to have less space for positive criticism (Bernard & Goodyear, 2009). Teachers feel totally left on their own with negligible intervention (Rous, 2004). This is because supervisors give the set rules to be followed by the teachers at the beginning, and then, observe their progress at the end of the allotted time.

- Informal mentoring is assumed nearly useless if there is no provision and acceptance of positive critical feedback (Tähtinen *et al.*, 2012). Informal mentors use positive criticism to minimise negative emotional fallout in an acceptable manner with mentoring skills (Healy & Welchert, 1990; Cherniss, 2007; Chun *et al.*, 2010). However, the procedure is flexible due to its liberal nature, and therefore, such mentors have a lenient intervention approach (Durlak, 2011).
- **Formal mentoring** promotes critical reflection (Devos, 2010) and hence, formal mentors have been sometimes reported as being overly critical (Ehrich, Hansford & Tennent, 2004). The formal mentoring programs are especially designed as interventions (Erickson, McDonald & Elder, 2009) and are often "guided by a desire to control the behaviour" (Philip & Hendry, 2000, p.222) of mentees through regular compulsory interventions. However, its extent varies with the external control of the organisation (Colley, Hodkinson & Malcolm, 2003; Sosik, Lee & Bouquillon, 2005).

The following three Likert items were included for this feature and the order of practices is shown below:

	Statements	1	2	3	4	5	6
1.	Class observation by your colleague (to						
	learn from him or to help him learn).						
2	Intervention in your independent						
	working/teaching style by your colleague.						
3.	Make positive use of criticism of your						
	current teaching practice by a colleague.						
			γ				
		Supe	Supervision		ormal	Fo	rmal
				Mei	ntoring	Men	toring

- 4. Frequency of interactions decides the intensification of a relationship (Desimone, Garet, Birman, Porter & Yoon, 2002; Subotnik, Edmiston, Cook & Ross, 2010) and its importance for CPD has been highlighted (e.g., Pogodzinski, 2012). This feature has also been accounted to judge the outcomes of mentoring (e.g., Parker, 2010). Moreover, it is recommended to ask about the limit of interactions preferred by participants while mentoring (Haggard et al., 2011). Hence, this feature was given importance because frequent interaction which is common in mentoring may not be welcomed by Indian teachers due to the workload they already have.
- Supervision usually involves infrequent visits without apparent logic to the timings and continuity of contacts (Ong'ondo & Borg, 2011). Irregularity in such interaction was highlighted by Rous (2004) when the supervisory visits were addressed as 'required visits' by the administration. It has been pointed out that supervisors only visit classrooms when it becomes necessary. In India, a supervisor usually contacts teachers 'once a month' to 'once in a quarter year'.
- Informal mentoring demands extended frequent interaction among the participants. Maintaining 'frequent-interaction' is one of the five main characteristic of a mentor which measures the quantity aspect of mentoring received (Ignash, 2007; Waterman & He, 2011). Informal mentoring needs frequent, long and consistent contact among participants for the purpose of sharing information which varies according to the need in its flexible nature (Kunich & Lester, 1999; Allen, Lentz & Eby, 2006; Haggard *et al.*, 2011).
- **Formal mentoring** has been compared to informal mentoring for the 'time spent together by the participants' (e.g., Chao, Walz & Gardner, 1992; Chao, 2009). There are compulsory regular meetings in formal mentoring to make relationship successful (e.g., Boyle & Boice, 1998; McDonald & Hite, 2005). Wilson, Valentine & Pereira (2002) while surveying new social work faculty members through the 'Council on

Social Work Education' to determine perceived benefits of mentoring relationships, identified the noticeable contribution of 'frequent meetings' to successful formal mentoring.

The following Likert item explored the preference of teachers for this feature and the recognised order of practices was:

	Statement	1	2	3	4	5	6
1.	Continuous involvement in professional						
	development practices.						
		Ψ,		$\overline{}$			
		Super	vision	Informal Mentoring		Forn Mento	

- 5. Commitment towards taking responsibility of another colleague is required to promote CPD (Krishnaveni & Anitha, 2008). According to Oglensky (2008, p.423) "commitment refers to the intention of staying in a relationship". There is need to put forth extra commitment and accept responsibility while mentoring (Sharma & Dutta, 2009). However, everyone may not be prepared for it (e.g., Varah, Theune & Parker, 1986; Harris, 1995; Mertz, 2004) which made it an important feature to inquire herein.
- Supervision needs commitment for the relationship to be successful; however, most participants are not much committed factually and only act to fulfil their duty (Ostroff & Bowen, 2000; Wanzare & Costa, 2000; Ostroff, Kinicki & Clark, 2002; Gollan, 2005). This may be because supervision is mostly a career related exercise (Chao, Walz & Gardner, 1992). It includes general support and the maintenance of relationships which usually rely on the willingness of the supervisor. Such an arrangement reduces interests in taking responsibility of a colleague (Rous, 2004; Gupta, 2007; Ascher & Butler, 2010).
- Informal mentoring involves commitment from both the participants (Chao, 2009) with a substantial emotional element (Bowen, 1985; Mullen, 2005). Commitment is well embedded in it (Hobson *et al.*, 2009) because such relationships originate naturally (Scandura & Williams, 2001; Allen, Day & Lentz, 2005). However, in the flexible nature of informal mentoring, the development of an individual depends on his/her own self, another person can only puts in some effort. Therefore, its flexible nature easily allows loosing commitment and giving up responsibility at any point of

time if either party feels stagnant and the relationship falls apart (Mathews, 2003).

• Formal mentoring relationship varies in its level of commitment (Haggard *et al.*, 2011) and researchers recommended exploring the affordable level of the participants for it. It has more commitment between participants than informal mentoring due to its apparent nature and official monitoring of the relationship (Allen & Eby, 2008). Formal mentors usually take more responsibilities than informal mentors because they have to show progress to the organisation (Hanson, 1996; Ehrich, Hansford & Tennent, 2004; Kilburg, 2007). However, such strong commitment and responsibility may superficially be part of their duty but they still have to fulfil it as a requirement of the job.

The following two Likert items represented this feature and practices showed the below order:

	Statements	1	2	3	4	5	6
1.	Take responsibility for the professional						
	development of your colleague.						
2.	Commitment towards the professional						
	development of your colleague.						
		_			γ	$\overline{}$	
		Super	Supervision		rmal toring	Forn Mento	

- **6. Trust in another colleague** is necessary for all interpersonal relationships (Bickmore & Cassell, 2001) and is described as "one party's willingness to be vulnerable to another party based on the [*sic*] confidence" (Tschannen-Moran & Hoy, 2000, p.556). The high level of trust is conductive for the CPD (Youngs, Qian & Holdgreve-Resendez, 2010) and has already been counted as an important factor for mentoring in India (Ramaswami & Dreher, 2010; George & Mampilly, 2012; Rekha & Ganesh, 2012). Hence the reason for its consideration here.
- **Supervision** literature is mostly incorporated with either lack of trust (e.g., Garman, 1990; Siens & Ebmeier, 1996) or breakdown in trust (e.g., Fenwick, 2001) among the participants. Usually the appointed supervisor by the higher authorities is unfamiliar with the supervisee which causes anxiety and fear in the sub-ordinate (Stoltenberg & McNeill, 1997; Ascher & Butler, 2010), and thus, reduces trust. Therefore, the development of trust seems complicated (da Costa & Riordan, 1997).
- **Informal mentoring** brings a higher level of trust (Mertz, 2004) in maintaining

confidentiality (Callan, 2006). The participants in it should be trusted and should be able to listen and speak openly about their experiences (Dirks, 2000; Mcguire & Reger, 2003). Hence, trust being the core of it and acts as a hallmark for the participants to put in their own effort (Sosik, Lee & Bouquillon, 2005; Zerwekh & Claborn, 2006; Chun *et al.*, 2010; Koç, 2012). The level of trust is higher due to its flexible, self-originated and non-authoritative nature which allows frustrations to flow freely (Sullivan & Glanz, 2000; Perunka & Erkkilä, 2012).

• **Formal mentoring** confers lesser trust than informal mentoring because it is initiated by the organisation but the frequent meetings (which are uncommon in supervision) help to somehow develop trust (Chun *et al.*, 2010). It succeeds if trust develops (Young & Perrewe, 2000; Bouquillon, Sosik & Lee, 2005), otherwise, frequent meetings with lack of trust are perceived as 'unwanted interventions' and even cause conflicts and bullying sometimes (Tepper, 1995; Scandura, 1998; Marable & Raimondi, 2007; Chun *et al.*, 2010).

The following two Likert items were included for this feature and the order of practices is shown below:

	Statements	1	2	3	4	5	6
1.	Trust on your colleague to discuss your professional or						
	personal problems.						
2.	Readily ask for help without the fear of being						
	criticised for your lack of knowledge.						
		$\overline{}$			$\overline{}$	$\overline{\Box}$	
		Supervision		Fo	rmal	Infor	mal
				Men	toring	Mento	oring

- 7. Readiness to share knowledge and to ask for help without the fear of feeling guilty for being unaware of something which is expected to be known by most people leads to successful relationships (Paris & Gesspass, 2001; Iliev, Iliev & Pipidzanoska, 2011). Successful relationships need skills, beliefs, and values to be shared for survival otherwise it results in low perceived morale (Luna & Cullen, 1995; Brunetto, Farr-Wharton & Shacklock, 2010). This is the reason why this feature was given importance.
- **Supervision** hinders sharing knowledge due to 'power-differentials' and 'top-down approach' (Arredondo, Brody, Zimmerman & Moffett, 1995; Wanzare & Costa, 2000). Its evaluative nature suppresses discussion over the weaker areas of the

profession (Cooper, Ehrensal & Bromme, 2005). It usually discourages information sharing due to the fear of being blamed for lacking knowledge because of its evaluative nature. Sharing information sometimes may result in stealing away of ideas as well. Moreover, sometimes supervisors also found lacking in information and less willing to share knowledge (Ostroff & Kozlowski, 1993) or even exercise favouritism (Gupta, 2007).

- Informal mentoring facilitates the sharing of knowledge to foster collegiality and collaboration (Ehrich, Hansford & Tennent, 2004). In this tradition the downward flow of information from mentor to mentee was embraced (Jones & Brown, 2011) whereas the developed mentoring theory believes that both (i.e., mentor and mentee) share knowledge with each other (Awaya *et al.*, 2003). Participants are not afraid to ask for help due to its flexible nature (Lock, Lee, Theoharis, Fitzpatrick, Kim, Liss, Nix-Williams, Griswold & Walther-Thomas, 2006); therefore, it is considered to be a tool for this purpose (Jones & Corner, 2012). Such relationships develop from shared interests to support an in-depth exchange of expertise (Noe, 1988).
- Formal mentoring has a power differential compared to informal mentoring which somehow suppresses open expressions, and people sometimes feel that others use their ideas to gain credit for themselves (Scandura, 1998). Formal mentors sometimes "provide more superficial suggestions/ideas...than informal mentors" (Sosik, Lee & Bouquillon, 2005, p.97) in order to fulfil duties which hinder high expectations from it. The formal nature of the relationship suppresses sharing of knowledge and makes the person hesitate to ask for help. However, it is not as unwelcome as in supervision. This could be because trust can somehow develop as a result of frequent meetings in formal mentoring. This helps to facilitate sharing of knowledge and usually creates an open environment where it is easy to ask for help, if needed.

The following Likert items explored the preferences of teachers for this feature and the recognised order of practices was:

	Statements	1	2	3	4	5	6
1.	Ask somebody to personally assist you in your professional development.						
2.	Share your teaching experience and knowledge with another colleague.						
	-			<u>_</u>		<u> </u>	
		Supervision		Forn Mento		Inform Mento	

- 8. Acceptance of the reciprocity in a relationship is as rare in the Indian context as it is in other Asian countries (e.g., Ng & Chow, 1999). Reciprocity differentiates mentoring, whether formal or informal, from supervision, coaching, tutoring etc. (Healy & Welchert, 1990; Haggard *et al.*, 2011). This feature was included because it has been highlighted that "Indian culture is more hierarchical and less egalitarian than Western cultures" (Ramaswami & Dreher, 2010, p.523) and Indian mentors are expected to have a paternalistic orientation instead of equality and reciprocity in the relationship (Aycan, Kanungo & Sinha, 1999; Sinha, Sinha, Bhupatkar, Sukumaran, Gupta & Gupta, 2004).
- **Supervision** places authority with the supervisor (Thornton, 1971) and does not possess reciprocity, i.e., supervisor cannot exchange his/her role with the subordinate. This is because supervisors often are "in leadership positions by the nature of their job title and description" (Rous, 2004, p.267). Therefore, its powered and controlled nature almost rules out reciprocity (Fenwick, 2001).
- Informal mentoring includes role-reversals (Spezzini *et al.*, 2009) when the novice could be the mentor and the veteran could be the mentee (Gabriel & Kaufield, 2008). The informal nature facilitates reciprocity and allows both the members to mentor each other simultaneously (Draves & Koops, 2011; Perunka & Erkkilä, 2012). In such relationships neither party holds power over the other (Landay, 1998; Chun *et al.*, 2010).
- **Formal mentoring** is usually associated with rank and the mentor plays a more dominant role than the mentee (Awaya *et al.*, 2003). The hierarchy is unavoidable (Chaudhuri & Ghosh, 2012) because the mentor has more power and status than the mentee (Thomas, Hu, Gewin, Bingham & Yanchus, 2005). Therefore, the idea of reciprocity is perhaps difficult to establish but not as much as in supervision.

The following two Likert items represented this feature and practices showed the below order:

	Statements	1	2	3	4	5	6
1.	You can learn from your junior colleagues .						
2.	Give equal importance to both, senior or junior, teachers for your professional development.						
		Super	vision	For Ment	rmal oring	Info: Mento	rmal oring

- 9. Length of contact with another colleague (Finkelstein, Allen & Rhoton, 2003; Smith & Ingersoll, 2004) or constant professional contact (Flores *et al.*, 2011) was brought to attention because numerous studies have found it to be an affecting factor to promote CPD (Turban, Dougherty & Lee, 2002; Hezlett & Gibson, 2005). It is found to be the third largest factor to promote CPD by Rous (2004) and its significance has already been confirmed by Spezzini *et al.* (2009) among 84 teachers in the US.
- **Supervision** relationships are mostly of much shorter duration and usually finish with job transfers or retirement or promotions because they depend on the managerial decisions and are professional in nature. Therefore, one may have different partners in a short period of time.
- Informal mentoring facilitates working together over an extended period of time (Awaya *et al.*, 2003). The extent of mentoring depends upon the length of the matured relationship (Kram, 1985; Higgins & Kram, 2001; Tonidandel, Avery & Phillips, 2007; Spezzini *et al.*, 2009). Longer relationships provide more mentoring (Burke, 1984). Informal relationships can last for many years, for example, it survived for 20+ years between a PhD graduate and his graduate advisor (Crone, 2011). The reason behind such observation seems to be 'loyalty' which is more commonly found in informal mentoring than in formal mentoring (Oglensky, 2008) due to its natural initiation and absence of evaluation.
- Formal mentoring is constrained to a fixed time period by organisations (Weinberg & Lankau, 2011). Chao, Walz & Gardner (1992) found a statistical significant difference in the length of relationship between formal and informal mentoring. Formal mentoring relationships are often found contracted for 6 months or a year (Sosik, Lee & Bouquillon, 2005). Such mentors usually assume it as a part of their job instead of taking it personally (Shore, Toyokawa & Anderson, 2008; Dobie, Smith & Robins, 2010). Such relationships are also affected by job transfers or retirement or promotions but not to the extent as in supervision because frequent meetings in it help to maintain better compatibility between the partners which usually extends the length of such relationships.

The following Likert item was included for this feature and the order of practices is shown below:

	Statement	1	2	3	4	5	6
1.	Involvement in a long term relationship with your colleague for your professional and personal						
	development.						
			$\overline{\gamma}$		$\overline{\gamma}$		$\overline{\gamma}$
		Supervision		n Fo	ormal	Inf	ormal
				Me	entoring	g Me	entorin

- 10. Giving priority to an organisation to choose colleague to facilitate own CPD (Allen, Lentz & Eby, 2006; Chao, 2009) was considered because people find satisfaction in tasks where they are given autonomy and flexibility (Mathew, 2007); however, there are risks involved. Autonomy provides job satisfaction (Lee & Phillips, 2006) but may affect progress if collaboration occurs with a wrong partner. It was an important feature to include because Yadav & Katiyar (2012) already highlighted that people in India firmly believe in the decisions of senior authorities to get guidance and for career-development.
- The Supervisor is officially appointed by the organisation (Alfonso, Firth & Neville, 1981); therefore, the possibility to choose a desirable partner is highly restricted. Placing experienced organisational choice over personal choice helps in avoiding disappointments later. The organisations know the skills and capacities of employees well and can provide a suitable match to facilitate CPD.
- Informal mentoring involves pairing depending upon the mutual choices of both the parties (Gehrke, 1988) and provides total independence to change partners without making the interruption noticeable or being answerable to the authorities if relationship remains unsuccessful (Chao, Walz & Gardner, 1992). There is a high possibility that the newcomers may choose a wrong partner based on social preference rather than a professional need. There are also other potential issues associated with it such as favouritism (Allen, Poteet & Burroughs, 1997), problems for minority groups, cross-gender pairing (Dreher & Cox, 1996; Ensher & Murphy, 1997) etc.
- **Formal mentoring** has limited flexibility in terms of choosing a mentor (Awaya *et al.*, 2003). Formal mentors are usually assigned by the organisations but sometimes there are options to select the partner from the choices given by the organisations. The provided choice of selection found facilitating more mentoring in such circumstances because matching is crucial (Brown, 2001; Carter & Francis, 2001; Gormley, 2008). It is observed that "If partners do not perceive a match, there is no mentoring" (Chao, 2009, p.318) at all in formal settings.

The following Likert items explored the preference of teachers for this feature and the recognised order of practices was:

		1	2	3	4	5	6
1.	Give priority to your organisation to choose an						
	observer for you (instead of one chosen by you) who						
	can help in your professional development.						
2.	A hierarchical structure in which seniors simply tell						
	juniors what to do.						
				$\overline{}$		Ψ,	
		Informal Mentoring			mal toring	Superv	ision

The continuum for the considered ten features has been summed up in Table 2.2 previously based on which Section-3 in the questionnaire and the interview questions 6 to 9 were developed to compare the perceived preferences of the teachers to the three practices.

2.7 Generated Research Instruments

The designed questionnaire and interview questions are discussed below.

• Questionnaire

The questionnaire included three sections, i.e., 1, 2 and 3 (appendix-2). Section-1 was designed to collect the demographic data of the participants such as age, sex, teaching-qualification and work-experience (altogether and in the present school).

Section-2 focused on collecting data in order to see the existence of mentoring among teachers, on satisfaction with present CPD practices and on the level of familiarisation with the term 'mentoring'. Based on Table 2.1, 13 Likert items were developed to collect responses for the extent of involvement in different mentoring functions. Previous research (e.g., Scandura & Ragins, 1993; Scandura & Williams, 2001) also demonstrates acceptable reliability and a constructed validity for such measures showing the existence of mentoring.

The Likert scales usually consisted of a five-point scale for the provided statements. However, it is suggested to have more than five points to prevent 'questionnaire-drift', i.e., the participant has to provide one type of view (positive or negative) for the posed statement (Wilkinson & Birmingham, 2003). More number of points on the scale gives more flexibility to the respondent and provides more accuracy. Herein, based on the

Table 2.3 Framework to the Questionnaire

Section	Number of statements per section		Focus of Statement	Number of statements per function/feature
			Help in planning.	2
			Assistance in learning.	2
		Professional	Give advice for career opportunities.	2
		Functions (10)	Provide feedback for the progress.	2
2	15	Tunetions (10)	Help in self-reflection.	1
			Provide long-term professional support.	1
			Provide genuine care as a person.	2
		Personal Functions (3)	Support and encouragement in difficult times.	1
		Satisfaction level (1)	Satisfaction with present CPD practices.	1
		Familiarisation (1)	Familiarisation with the term 'Mentoring'.	1
			Feature related to	
		Solemnity and type of e	3	
		Time consumption and	workload.	2
		Positive criticism of/ int	tervention in the working style.	3
		Frequency of interaction	ns.	1
3	20	Commitment towards ta	aking responsibility of another colleague.	2
		Trust in another colleag		2
		Readiness to share know	vledge and to ask for help.	2
		Acceptance of the reciprocity in a relationship.		2
		Length of contact with a	1	
		Giving priority to an org	ganisation to choose colleague to facilitate own CPD.	2

different nature of enquiries in the research questions, the number of points on the designed Likert scales varied in different sections of the questionnaire.

Section-2 consisted of a five-point scale from 1= Never to 5= Always because it included 13 items for the same target and the rest of the two statements were for two different purposes whereas Section-3 was based on a six-point scale to compare three practices through dissimilar features. Six points were deliberately included to represent 3 practices instead of one point for each. It was done to minimise the effect of 'questionnaire-drift'. The dissimilar order for the three practices on the scale for different features also helped for this purpose.

Section-3 included 20 statements to address ten common features of the three practices which have been listed in Table 2.2. This section explored the preferences of teachers to the considered features on a six-point scale labelled from 1= Least preferred to 6= Most preferred. Table 2.3 details the considered number of statements per function and feature in the questionnaire.

• Semi-Structured Interview

In total, 8 interview questions were asked with different specific interests (appendix-3). The interview questions were similar for all the interviewees from the six schools irrespective of their age, teaching-subject, work-experience, designation and organisational-sector. However, the questions slightly differed for an interviewee from Delhi University (appendix-4) who shared the perspectives of the stakeholders. The difference existed in terms of presenting a comprehensive picture for all the schools in India which may be either government or private.

2.8 Sample

The sample selection is an important stage in a mixed-method study (Collins, Onwuegbuzie & Jiao, 2007). The main characteristic of sampling in such research demands it to address the research questions with a possibility of having multiple samples to suit both, i.e., qualitative and quantitative, methods (Teddlie & Yu, 2007). Therefore, the 'parallel mixed-methods sampling' which includes different sampling techniques concurrently to support quantitative and qualitative methods simultaneously (Teddlie & Tashakkori, 2009) was employed herein.

The cluster-sampling helped to approach the schools as units and then teachers as subjects

for the purpose of surveying whereas the purposive-sampling with the choice of the researcher was based on various criteria such as specialist knowledge and capacity to participate (Jupp, 2006). However, the purposive-sample could not be a representative of the population for drawing generalisations similar to the cluster-sample "but for researchers pursuing qualitative or mixed methods research designs, this is not considered to be a weakness" (Laerd, 2012, n.p.) of this technique.

The 'parallel mixed-methods sampling' helped to select the best respondents while giving top priority to the research questions and satisfied the specific needs of the project (Robson, 2011; Sharp, Mobley, Hammond, Withington, Drew, Stringfield & Stipanovic, 2012). The participants herein were approached with an aim to obtain best knowledge from those who were willing to share and could have the means to serve the research questions at best. The group of 'knowledgeable people', i.e., those had an in-depth knowledge of particular issues (Cohen, Manion & Morrison, 2007), were approached at both stages of sampling. They were school teachers, principals, managements of schools (in the private schools only) and the relevant stakeholders. In total, six schools were involved which allowed comparisons among them and offered a rich harvest of lessons and insights in this project (Zartman, 2005).

It is worth mentioning here that taking more than one school into account ensured variation among the samples. However, this does not mean that the participating six schools represented all the schools of Delhi (or India) and were dissimilar in every sense to provide generalisations (Denscombe, 2007). Pseudonyms were allotted to the schools from A to F (in the order they were approached) to maintain anonymity. Individual schools have been described below.

School-A: It was a private senior secondary school run by a well established management with approximately 75 teachers and other non-academic staff. It was a part of an educational society and consisted of various organisations in Delhi and the outskirts of Delhi from Kindergarten to PhD courses. It was affiliated to CBSE and had various international contacts and staff-exchange programs to promote CPD of teachers.

School-B: It was a private senior secondary school which was a part of a series of 700 organisations. This school-series was established nationally. It designed and promoted specific teacher development programs and consisted of approximately 150 teachers and other non-academic staff members.

School-C: It was a private senior secondary school and was affiliated to CBSE. It consisted of approximately 180 teachers with other non-academic staff. It had its own professional development policies and programs for teachers.

School-D: It was a primary government school which was managed through the guidance of government policies of the MCD. It consisted of 13 teachers and non-academic staff. The CPD of teachers was promoted through the directives available from the MCD.

School-E: It was a primary government school which was managed by the MCD through government policies. The organisational rules and regulations of the MCD were available for the CPD of teachers. It consisted of 25 teachers and other non-academic staff members.

School-F: It was a primary government MCD school and embraced government policies for the development of teachers. It consisted of approximately 16 teachers and other non-academic staff.

At the time of 'self-administration' of survey, it was ensured with the help of 'contact-persons' that questionnaire was received by every teacher in the schools when circulated by peons except in School-C where a subset of only 33 teachers (depending upon availability) was allowed to interact at the time of 'group-administration' of survey. The received response-rate varied with each school (see Table 3.3). The possible interviewees from each school were approached with the requirement of interacting with,

- (1) A new and junior teacher
- (2) An experienced and senior teacher (with approximately 2 to 5 year experience), and
- (3) A member of management or person in the role of counsellor, supervisor, observer, facilitator etc. or principal.

Such an approach to the interviewees was essential to understand the insights to the research questions from different perspectives. The variation was sought for the 'designation', 'work-experience', 'familiarity with the school environment', and the 'contribution to decision-making in the school for the development of teachers'.

The aforesaid 3 interviewees were approached in each private school but for all the three

government schools the management was the same 'Government-authority'; therefore, a principal from one of the government schools (i.e., School-E) represented the perspectives of the Government for all. This interviewee also represented the senior interviewee for this school. Another interviewee from School-E was a junior teacher. From the other two government schools, two interviewees, a junior or new and a senior or experienced teacher were approached.

In addition, Rajan (2012, p.11) suggested that "a meaningful in-service program cannot be visualized without consulting all stakeholders" in India; therefore, an expert from the 'Department of Education, Delhi University' was also interviewed to collect the insights of the stakeholders. Only one candidate was approached to make sure the data were easy to manage in a doctoral study schedule.

2.9 Pilot Phase

A pilot phase was included to examine the accuracy and appropriateness of the designed research instruments. It was conducted in the month of October 2012. The researcher was in the UK at that time and it was not possible to personally approach the schools for this purpose. Therefore, the questionnaire and the interview questions were e-mailed to the two private schools, i.e., School-A and School-B, which were available at that time to get relevant feedback. These two schools had already given their consent to participate in this study in 2011 when approached with just the research idea whereas the rest of the four schools joined in 2012 when the actual field work started after the approval of the research proposal.

The questionnaire was attempted by four teachers, two from each school, and the interview questions were read by the concerned school authorities. There were no major changes suggested and later, the instruments were finalised with their acceptance.

However, a change was made in the questionnaire later when concern was raised by the government authority during the actual field work in November 2012. The authority demanded that a Likert item from Section-2 of the questionnaire should be removed which was 'I have a colleague who genuinely cares for me as a person'. Hence, this item was completely excluded when the overall calculations were made for all the six schools.

2.10 Procedures to Data Collection

The following actions were taken when data were collected:

• Obtaining permission

It was necessary to obtain formal written permission from all the six schools for this research. According to the findings in the literature review mentoring seemed to be a new area of research among Indian teachers hence it was encouraged by the supervisory team at that time to contact schools in Delhi to get a preliminary consent for this project. Therefore, conveniently accessible 25 private schools were approached in October 2011 with a research idea only without a formal proposal. Out of 25, three schools showed a willingness to participate and gave their written consent (appendices 5 and 6). The reason for this low response-rate at that time could be because the project was merely an intention and was planned to start in the year 2012 (after the approval of the proposal) which might have affected the interests of the approached schools. Later, one school withdrew when the actual field work started in the month of November, 2012 because the schedule for the 'Annual program' of school coincided and staff were otherwise engaged. Therefore, at that time, another 5 private schools (which were not approached previously) were contacted and from them one school replaced the school that withdrew (appendix-7).

For the consent from government schools, the Department of MCD and 'Directorate of Education, Govt. of NCT of Delhi' were approached in November, 2012. The 'Directorate of Education, Govt. of NCT of Delhi' which had authority over secondary schools declined to participate in this study because it preferred collaborating with large scale projects which are managed by high level organisations instead of small scale individual research. However, the MCD found the proposal interesting and gave consent (appendix-8) to work with 3 schools from the Rohini zone, North Delhi. Thereafter, individual government schools were informed of the research by the zonal office of MCD, and after their expression of interest they willingly participated in this research.

The 'MCD' for government schools and the 'school-managements' for private schools acted as gatekeepers to provide permission to this project. Lee (1993 quoted in Cohen, Manion & Morrison, 2007, p.123) pointed out that "Access might be gained through gatekeepers that is those who control access" to conduct research. However, all the participants were also requested to provide a separate formal written consent (appendix-9) before attempting the questionnaire and prior to being interviewed.

The interviewees were suggested by the school authorities according to the requirement of the study. However, they had the right to deny or withdraw from the research at any point of time. The right to deny was exercised by a teacher in the School-E who refused to be

interviewed. At that time, another teacher was approached and interviewed after receiving consent.

• Preferred Language and Mode of Recording

This aspect was considered because the participants were bilingual and the official language of the participating schools was either 'Hindi' or 'English'. Hence, the issue of working across two different languages was taken care of. The questionnaire was translated by a professional translator into Hindi and was double-checked by the researcher to avoid expected alteration of meanings of the statements (appendix-10). It was provided to the participants in both languages. The respondents were free to choose the translation as per their convenience. In field work, the respondents in the private schools preferred the English version and in the government schools opted for the Hindi translation of the questionnaire.

All the interviews were also conducted bilingually (i.e., Hindi and English) as per the convenience of the interviewees. The interviews were audio-recorded with the help of a 'tape-a-talk' app through an android phone whenever permitted otherwise hand written notes were taken.

• Schedule

All the schools provided their available schedules for the distribution of the questionnaires and for interviews when first approached. The procedure varied among them according to their convenience. The detailed program of field work in the schools is summed up in Table 2.4 on next page.

• An Employed Tactic

The accessed literature herein indicated that it could be the case in field work that interviewees may not know the term 'mentoring' or may be unable to relate its concept to the term 'mentoring' straightaway (see section 1.3.1). In such circumstances, a few measures were planned to facilitate the interview for 'mentoring'. An initial tactic included attempting questionnaires before being interviewed so that the interviewee could develop rudimentary perception for it. Additionally, when the interviewee was found unfamiliar with the term 'mentoring', its functions from the questionnaire were linked in order to help to be pondered by the interviewee to facilitate the interview. At none of the

Table 2.4 Schedule of Field Work

School	Number of Days Taken to Complete the Questionnaire	Type of Survey	Preferred Type of Recording for Interview
A	7	Self-administered	Audio-recorded (2) and Hand written (1)
В	7	Self-administered	Audio- recorded (3)
С	1	Group-administered	Audio- recorded (3)
D	6	Self-administered	Hand written (2)
Е	5	Self-administered	Hand written (2)
F	5	Self-administered	Hand written (2)

point in the research was a definition provided because such a technique has been found to distort the perceptions of the participants about the concept of mentoring (Haggard *et al.*, 2011) and might have altered the results for this project.

• Documents Collection

The concept that the organisational documents are "written by skilled professionals and may contain more valuable information" (Cohen, Manion & Morrison, 2007, p.201) was of very little use in this study as compared to other employed methods. This was because it was not easy to find the right documents and access them in the schools for research purpose when requested. Only two private schools shared such information and the third private school denied access to them. The government schools did not have specific documents at the school level to share other than those issued by the Government on a larger scale. Hence, no documents were provided when requested.

The documents examined for credibility and representation (Ary *et al.*, 2009) were the policies, booklets, pamphlets and classroom observational sheets related to the CPD of teachers from the two private schools which shared this information. The documents were read carefully to extricate the desired information that was related to the CPD of teachers and summed up in the chapter of results.

2.11 Data Analysis

The collected data from each method were analysed separately. The outcomes were then integrated and unified to address the dual nature of the data (i.e., quantitative and qualitative) to present overall results of each research question in this project. Such an approach was applied because it is recommended for a mixed-method research which used 'questionnaires' and 'interviews' that both "data sets should be analysed separately using methods suitable to each; then results can be compared to see if any common messages resonate from both sets of data" (Harris & Brown, 2010, p.11).

Also, Creswell & Plano Clark (2007, p.128) suggested that "Data analysis in mixed-methods research consists of analysing the quantitative data using quantitative methods and qualitative data using qualitative methods". Consequently, 'parallel-mixed' analysis which is the most common technique for the analysis of data for mixed-methods research was applied (Tashakkori & Teddlie, 1998; Onwuegbuzie & Leech, 2004; Teddlie & Tashakkori, 2009; Tashakkori & Teddlie, 2010). The 'parallel-mixed analysis' is also known as 'parallel tracked analysis' (Li, Marquart & Zercher, 2000) and consists of

"...two separate processes: QUAN [quantitative] analysis of data, using descriptive/inferential statistics for the appropriate variables, and QUAL [qualitative] analysis of data, using thematic analysis related to the relevant narrative data." (Teddlie & Tashakkori, 2009, p.266)

Such a procedure uses two independent ways of analysis but the understandings of both are linked, combined and integrated which may lead to convergent or divergent results. Hence, the interview data were analysed through 'thematic analysis' in 'NVivo software' and the questionnaires data were analysed by 'descriptive/inferential statistics' in MS-Excel and SPSS. Later, the separate results from the interviews, documents (wherever applicable) and questionnaires were integrated to present the overall findings for each question which are listed in the next chapter and discussed in Chapter-4. The procedures of data analysis are described below.

• For Interviews

Thematic analysis which is a common approach to examine qualitative data was used. This enabled to introduce the transcripts into the computer software -NVivo (Bryman, 2012) to be scrutinised. It involved the following preparations in NVivo:

1. Construction of an index with central themes and subthemes as codes or nodes, as they were referred to in NVivo software.

2. Representing the themes, i.e., applying the nodes to segments of text from the transcription of interviews.

3. Application of framework to data, i.e., use of coding strips in NVivo software.

Initially, the deductive approach was applied to the data around the themes that were parallel to the questionnaire items. Later on, some of the additional themes also emerged based on the functions of mentoring when an inductive approach was used.

There use to be undeniable conflicts while working across two different languages and a need to translate the data from one language to another. To minimise such an impact, the exact words in Hindi were carefully translated to English with the maximum effort to avoid the alteration of meaning to help the reader of this thesis. Further, as prescribed by Bryman (2012), data from the interview transcriptions were reduced subsequently several times to come up with more concise and clear information. This helped to make clear 'Nodes' for recurring words, ideas, subjects and phrases to find the answers to the research questions. The reduced data were exported from NVivo to 'MS-word' for easy access and to use different colour coding when there was a need to differentiate between different themes, interviewees and schools.

• For Questionnaires

The questionnaire was pre-coded (appendix-11). The hard copies of the questionnaires were provided with the case ID numbers, and the responses were introduced into a MS-Excel 2010 file and SPSS. To avoid confusion two separate spreadsheets were used to analyse the responses from Section-2 and Section-3 of the questionnaires. Initially, descriptive statistics were applied followed by inferential techniques. In SPSS, based on the test for normality (i.e., Shapiro-Wilk) subsequent further analysis through t-test, ANOVA, Mann-Whitney U and Kruskal-Wallis tests were followed using various independent variables to make comparisons. The results with further details are listed in the next chapter.

For section-2: The points on the Likert scale were coded as:

1 = Never,

- 2= Sometimes,
- 3= Frequently,
- 4= Most Frequently, and
- 5= Always.

The responses to the 3rd, 4th and 5th point on the Likert scale were counted to confirm the 'existence of mentoring' among teachers, satisfaction level with the existing CPD practice and the 'familiarity to the term mentoring'. In MS-Excel, the average response for each 'mentoring-function' was calculated to examine the involvement of teachers in that function. The overall involvement in all the functions was also calculated through the average of all the responses from the items 1 to 13 (see appendix-12 for working). The satisfaction level with existing practices and the familiarity with the term 'mentoring' in schools were calculated through the average response from all teachers. Average response was also calculated for individual schools and different type of schools to make comparisons. All three concerns were analysed using different tests in SPSS. The effects of demographic factors on the extent of informal mentoring received were also examined in SPSS.

For section-3: Depending on the nature of enquiry and the data (i.e., ordinal) descriptive statistical analysis was initially applied in MS-Excel. The 'Mean' of the responses through 'Central Limit Theorem' was calculated for a feature (out of 10) which was represented by 2 to 3 statements. Afterwards, the 'Mode' of the responses to all 10 features was calculated to find the overall preference of a teacher. The six point Likert scale was from 1 (= least preferred) to 6 (= most preferred) for a feature and was divided into three sets of two points each. Depending upon the Table 2.2 above, each set of two consecutive points (starting from 1) reflected the response to one particular practice out of three. For example, the feature 'solemnity and type of evaluation' was arranged as:

Table 2.5 Pattern in the Continuum

Solemnity and type of			→
evaluation	Informal Mentoring	Supervision	Formal Mentoring

The three statements which represented this feature on the Likert scale are shown below in

Table 2.6. Here, based on the pattern shown above in Table 2.5, points 1 and 2 on the Likert scale counted for 'Informal Mentoring', 3 and 4 for 'Supervision' and 5 and 6 for 'Formal Mentoring'. A similar strategy was followed for all the other nine features.

Table 2.6 Likert items to 'solemnity and frequency of evaluation'

S.no.	Features of professional development activities	1	2	3	4	5	6
1.	Written feedback of your overall performance by a						
	colleague.						
2.	Brief and direct evaluation of your teaching practice						
	by a colleague.						
3.	Frequent and continuous evaluation of your progress.						
		$\overline{\qquad}$		\setminus		\searrow	
		Informal Supervision		For	mal		
		Mento	oring			Mento	oring

To find the preference for this feature, the 'Central Limit Theorem' was applied to calculate the average response from the three Likert items. A similar procedure was followed for the other nine features. Later, the 'Mode' of 10 responses represented the overall preference of a teacher to a particular practice (see appendix-12 for working). Later, 'Means' were compared across the data to find overall preference (1) of a school, (2) for all the schools, and (3) between two types of schools.

For Documents

The documents were read carefully to find parallel information with the themes from the questionnaires and interviews. Apart from the considered themes, other CPD activities for teachers which were in action in the two schools were also studied. The lists are detailed in the next chapter and sample documents have been included as appendices (13 and 14) at the end of the thesis.

Although this research had fixed research questions to ask through the mixed-methods approach, the qualitative approach provided more flexibility to accommodate contingent themes than those which were targeted. Such syntheses helped to endorse or deprecate the emergent results from different methods in the light of well-established literature. Thus, the findings from one method were coordinated to "illustrate, enhance, help to explain, or refine the other set of findings" (Greene, Benjamin & Goodyear, 2001, p.31).

2.12 Credibility

Credibility in research "refers to whether you can believe your results" (Zamboni, 2015, n.d.) or simply, the trustworthiness of the results (Bryman, 2012). Credibility can be evaluated by checking the similarities between the results and research questions. There are different ways to ensure credibility in research (Mertens & Hesse-Biber, 2013). Apart from ethical considerations that have been elaborated on in next section below the following procedures were employed for this purpose in this project:

- **Employment of mixed-methods-** A pragmatic-approach was used which collected both, quantitative and qualitative, data. This was done to corroborate the results and to ensure the conclusions.
- **Concurrent data collection-** Both the methods, i.e., quantitative and qualitative, were applied concurrently to integrate the information collected for overall results.
- Screening of interviews- Records of interviews were returned to the interviewees to ensure the accuracy of the documented information. The concept was derived from the work of Merriam (1998) who suggested doing 'member-checking' by returning the interview data and tentative interpretations to "the participants to confirm, correct or expand any information presented".

2.13 Ethics

Ethics in research is referred to as 'the rules of conduct to conform a code' or 'set of principles' that should be considered while dealing with participants in a study (Israel & Hay, 2006). Ethical approval for this project was granted by the Research Ethics Committee of Bangor University (UK). The actions mentioned below were adhered to for this purpose:

- **Briefing with research**: Participants were provided with the written detailed necessary information in the consent form for the research interests.
- **Right to withdraw/deny**: All the participants were made aware of their right to refuse to answer or opt out of the study at any point of time. One school at the initial

stage and one teacher in participating School-E had refused to engage in the study.

- **Informed consent**: Participants were provided with informed consent before engaging in the research. All of them were happy to provide written consents which have been filed for the record.
- Interview verification: Interviewees were provided with their own interview record for screening to make sure of the accuracy of the data. This also provided an opportunity for the interviewees to reflect on and to provide any additional information that was left to share.
- Maintaining anonymity and confidentiality: The schools and the interviewees were
 given pseudo-names to maintain their anonymity and none of their personal details
 were shared. All the interviews were conducted privately in a separate room at each
 school location.
- **Right to choose a preferred language**: The questionnaire was provided in both Hindi and English languages. Initially, the school management opted for the language they prefer; however, all the individual teachers were free to choose their preferred language to fill the questionnaire as per their convenience. Interviewees were also free to use their preferred language out of Hindi or English. Therefore, the data from all the 16 interviews were bilingual.
- Translation of Interview Data: Bilingual (i.e., English and Hindi) interview data were carefully translated to English to convey a clear representation and analysis of it in the thesis.

2.14 Summary

This chapter has described the methodology used in this project including research design, procedures, instruments and samples. It has also detailed the data analysis procedures. The credibility of this research has also been strengthened due to the importance given to the ethical considerations in the course of this study. The next chapter now lists the results that followed.

This chapter reports the results from the questionnaires (N=171), interviews (N=16) and documents (N=2) which have been organised around the five research questions. The procedures to data analysis have already been explained in the previous chapter (section 2.11).

The results showed the existence of informal mentoring among the participating teachers and revealed its concept; however they were less familiar with the term 'mentoring'. Moreover, the outcomes vary between the two types of schools. Their involvement in informal mentoring varied with some of the considered demographic factors which have been detailed in section 3.4. The teachers were satisfied with present CPD practices but the level of satisfaction significantly varied among them. They preferred mentoring to supervision but approach to it, i.e., formal or informal, differed with the type of school in which they were employed.

The findings have been listed in five segments respective to each research question for the:
(1) existence and concept of informal mentoring, (2) familiarisation with the term 'mentoring', (3) demographic factors which affect the extent of informal mentoring experienced, (4) satisfaction with the present CPD practices and, (5) the preferred CPD practice. Firstly, the demographic data for the sample have been presented below.

3.1 The Demographic Data

The analysis of demographic data for the participants showed the following patterns:

• From questionnaires

The number of teachers who attempted the questionnaires (N=171) varied with each school along with the type of school they were from. The proportion of participants from each school is shown later in Table 3.3 and the different types of schools are listed in Table 3.1 below.

Table 3.1 Sample Distribution for the Type of School

Type of school	Total responses	% of sample (app.)
Private	136/171	79.5
Government	35/171	20.5

Unlike the interviews, where staff were selected based on seniority in order to enable views to be expressed by staff at various stages of their career, information about the seniority of staff who returned their questionnaires was not available. The teaching-subject of 68 teachers was 'All-subjects' at primary level (approximately 40% of sample) that included English, Mathematics, Science, SSt and Hindi. The other teachers taught Languages (41), Sciences (20), Mathematics (12), SSt (9), Economics (1), more than one subject (16) and various other subjects (3). I teacher did not respond to this enquiry. The distribution of participants from different age-groups is shown below in Table 3.2.

Table 3.2 Sample Distribution for the Age-Groups

Age-Group	Number of	% of sample		
	respondents	(app.)		
Missing responses	1	1		
≤25	28	16		
26-30	30	17		
31-35	25	15		
36-40	29	17		
41-45	31	18		
46≤	27	16		
	171			

The 'teaching-qualification' of 120 teachers was BEd and others were qualified with BElEd (11), MEd (2) and NTT (3). 8 teachers possessed both qualifications BEd and NTT whereas 9 teachers had alternative 'teaching-qualifications'. 18 teachers did not respond to this variable. The Table 3.3 details the other particulars of the sample and Figure 3.1 below highlights the distribution of the teachers according to their work-experience.

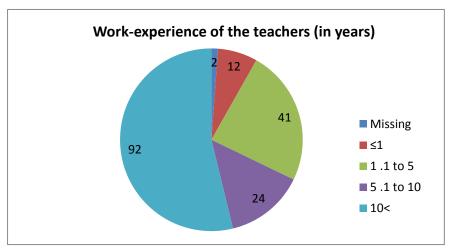


Figure 3.1 Distribution of the Participants for 'Work-experience'.

Table 3.3 Sample Description from Individual School

School	Type of school	Total number of teachers	Number of teachers participated in the Quest.			Female Teachers in the Quest.	Male Teachers in the Quest.	Number of interviewees
A	Private	75	54	25or below: 17 26-30: 12 31-35: 10 36-40: 6	41-45: 5 46 or above: 4 Missing: 0	49	5	3 (1-new teacher,1-senior teacher, 1-member from management)
В	Private	150	49	25 or below:3 26-30: 3 31-35: 7 36-40: 9	41-45:12 46 or above:14 Missing:1	49	0	3 (1-new teacher,1-senior teacher, 1-member from management)
С	Private	180	33	25 or below: 6 26-30: 13 31-35: 5 36-40: 6	41-45: 3 46 or above: 0 Missing: 0	31	2	3 (1-new teacher,1-senior teacher, 1-member from management)
D	Govt.	13	10	25 or below: 0 26-30: 0 31-35: 1 36-40: 2	41-45: 3 46 or above: 4 Missing: 0	10	0	2 (1-new teacher,1-senior teacher)
Е	Govt.	25	13	25 or below: 1 26-30: 1 31-35: 1 36-40: 3	41-45: 6 46 or above: 1 Missing: 0	12	1	2 (1-new teacher,1-member from management)
F	Govt.	16	12	25 or below: 1 26-30: 1 31-35: 1 36-40: 3	41-45: 2 46 or above: 4 Missing: 0	12	0	2 (1-new teacher,1-senior teacher)

• From interviews

In total, 16 interviews were conducted. 9 of them were with the private school staff, 6 were with the government school staff and 1 was with a stakeholder from Delhi University.

The interviewees were from the age-group of \leq 25 (N=3), 26-30 (N=3), 36-40 (N=3), 41-45 (N=2), 46 \leq (N=4), and 1 interviewee did not respond. They taught 'All- subjects' at primary level (N=6), Sciences (N=3), Mathematics (N=2), English language (N=2) and 1 did not respond. The rest of the two interviewees were in supervisory roles instead of teaching. The 'teaching-qualification' of the interviewees was mostly BEd (11) and only a few of them were qualified with BElEd (1) or JBT (1). One of the interviewees did not respond to this concern and another who used to supervise the teachers did not have any teaching-qualification. However, this interviewee had an MPhil in counselling and used to counsel the teachers. The interviewee from Delhi University was also pursuing an MPhil in Education.

3.2 The Existence and Concept of Mentoring

The results for the 'existence of mentoring' among teachers were derived from the data collected through the first 13 Likert items (excluding item 11; see section 2.9) from the Section-2 of the questionnaire and the interview questions from 1 to 4.

Table 3.4 Total Response on the Likert Scale for the 'Existence of Mentoring'

Likert Scale	Label	Response (in %)
1	Never (N)	1
2	Sometimes (S)	6
3	Frequently (F)	18
4	Very Frequently (VF)	30
5	Always (A)	45

Overall, 93 % (=18+30+45) teachers in the questionnaires agreed to the 'existence of mentoring' (Table 3.4) among them when their involvement in 8 functions of mentoring was explored. Similar results were also confirmed by all the interviewees (N=16).

In this project, some of the mentoring functions were pre-determined to explore the 'existence of mentoring' among the teachers while other additional functions emerged

from the interview data to confirm the same. The **pre-determined explored functions** were:

1. Help in planning: The following two Likert items in the questionnaire explored this function and confirmed that approximately 93% of teachers were involved in it. The

Statement	N	S	F	VF	A	% response
I have a colleague who helps me in						
the planning of my work	5	10	26	47	83	100
I often help my colleague to plan						
his/her work.	1	7	31	50	81	99

same sort of engagement of teachers in this function was also confirmed by 7 interviewees. For example, a senior teacher from private School-A responded as "...Yes, they [teachers?] do curriculum discussion, find areas to help each other and cater need via newspaper, by presentations, [by] sharing new write ups, [by] attending workshops in other schools and share these in our school". Another interviewee from School-C who was familiar with the practice of mentoring also added her experience of getting help in planning from her senior. She said, "...She [facilitator?] mentors that 'what should we do?', 'How can we do it?', 'give resources', 'make us understand the things' [and] 'explains everything again and again'."

2. Assistance in learning: The two Likert items in the questionnaire which explored this function have been shown below. The results showed that 93% of teachers were

Statement	N	S	F	VF	Α	% response
I have a colleague who assists me in learning the technical aspects of teaching job.	3	13	28	58	69	100
I assist my colleague in learning the technical aspects of teaching job.	1	8	40	47	73	99

engaged in this function. All the interviewees (N=16) also showed their involvement in it. It was also observed that teachers were open-minded and free to ask for assistance from their colleagues when in need.

For example, a senior teacher from School-C shared the event of taking assistance in

learning from her colleagues without hesitation. Such actions were not usual in the hierarchical Indian culture which embraces supervision and in fact were in-line with the nature of mentoring. She said "...If I am in some problem, [then] at least I can approach to some of my co-teachers to seek that help. It may be as simple as solving a question which I am not able to do...otherwise...it becomes very humiliating for other teachers to approach their co-teachers and to accept [and] ...say that 'I do not know so can you help me learn?' [It] becomes an ego hassle. [Teachers are] ...able to show that confidence and trust [in this school]. [Words] that 'see its ok and you will be able to do it' give you [a] lot of encouragement."

3. Giving advice: The following 2 Likert items explored the existence of this function and the results revealed that nearly 92% of teachers were involved in it.

Statement	N	S	F	VF	A	% response
I have a colleague who advices me						
about new learning opportunities.	6	10	33	52	70	100
I advice my colleague about new						
learning opportunities.	0	12	32	60	63	98

The experience to this function was directly mentioned by only one interviewee. A junior teacher from School-A said "...We take advice. Advice is there but we can mould [it] according to [ourselves]. [It is] not directly by principal or senior[s] but section-peers help us" (T).

However, indirect experiences about the exchange of advice were shared by 4 other teachers. These interviewees highlighted that teachers welcomed advice from everyone regardless of their designation in the school. Such behaviours were parallel to the reciprocal nature of mentoring practice. For example, an interviewee from the management of School-A said "...Technology....As new teachers came up, this new generation is more flexible...one of my colleague and the co-ordinator, sometimes for interactions and communications...use mobile phones...I [was] use[ing?] SMS but one of my junior said, 'you have 'whatsup app' free messages'. So a new application they taught me otherwise I was not able to [use it]".

It was also revealed through interviews that the seniors were not authoritative enough for their advice to be followed by the juniors. Such freedom is usually provided in informal mentoring. For example, a senior teacher from School-F said "...I do not like

interference. I can give advice. It is up to her [junior teacher?] to follow."

4. Providing feedback unofficially: 2 Likert items explored the existence of this function. The results highlighted that 90% of teachers were involved in it and 11

Statement	N	S	F	VF	A	% response
I have a colleague who gives me						
feedback regarding my work.	2	11	38	51	68	99
I give feedback to my colleague						
regarding his/her work.	3	19	36	52	58	98

interviewees also shared their experiences of providing feedback to their colleagues at their personal level. Teachers also agreed with the confidential nature of the feedback provided. For example, a senior teacher from School-B said "...That is my nature. I try to say - 'This is what you have done.', 'This is absolutely not right.', 'Students would have not understood it'. 'If Mam [sic] will see so she will be very annoyed'. At my own level, I will tell her... 'You just improve and next time you make sure that this is not done like this'...I will explain it at my level and if Mam [sic] is asking so I will say, 'in next free period I will try to be there'. So I will try to correct. I do not want that I carry a total negative report of hers" (T).

5. Reflection for learning: The following Likert item explored this function and found that 89% of participating teachers were involved in it. 5 interviewees also referred to

Statement	N	S	F	VF	A	% response
My colleague helps me to reflect						
on my teaching practice.	7	11	26	52	72	98

this function. However, the shared experiences for it were indirect and related to the school-system instead of an individual specific event. For example, an interviewee from the management of School-A explained how the coordinators help new teachers to reflect upon the 'teaching patterns of seniors' and 'the school system' to learn the organisational culture.

She said "...In our school...They [teachers?] learn by doing mistakes...On very first day, after their selections...they are handed over to the coordinators, and mostly it happens that they are not immediately send to the classes. They are first being kept with the coordinators. They [teachers?] are helping her [co-ordinator?] with

rechecking work or other things so they come to know about the system....we actually give them that time".

6. Long professional relationships: 92% of teachers were involved in a long-term professional relationship with their colleagues when it was explored with the help of the following Likert item. However, there was only one reference to this function by

Statement	N	S	F	VF	A	% response
I am involved in a long-term professional relationship with my colleague.	6	7	31	47	79	99

the interviewees, and that was also not directly related to the present workplace. A junior teacher from School-F said, "...They [senior teachers?] use to discuss professional and personal problems and seek help. We trust them. Even I have a friend from an old school who still helps me [in this way]."

It is not surprising to have only one reference to long-term mentoring relationship because 9 other interviewees had simultaneous short-term relationships which were in-line with the "constellation of relationships of mentoring" (Higgins & Kram, 2001). Such short-term mentoring relationships are more common nowadays as compared to long-term relationships.

7. Genuine personal care: The following Likert item in the questionnaire explored the existence of this function and the results showed that 99% of teachers did exercise it

Statement	N	S	F	VF	A	% response
I genuinely care for my colleague						
as a person.	0	2	18	44	106	99

and 10 interviewees also agreed that they received personal care from their colleagues. For example, a junior teacher from School-A said, "...Over here, we develop our personal relationships also ...they [senior teachers?] help us with that as well. So it's both professional and personal...We have so many things to discuss. Sometime we need help with very little things also and they help us with that...so many informal helps are [sic] given to us". Providing personal care in addition to professional support is unique to mentoring as compared to other analogous practices

such as supervision, coaching and tutoring.

8. Providing support and encouragement in stressful times: The following Likert item explored the existence of this function and the results showed that 96% of teachers were involved in it and 8 interviewees were also highlighted receiving such

Statement	N	S	F	VF	A	% response
I have a colleague who provides support and encouragement to me in stressful times.	1	6	21	51	90	98

support. However, they had not shared direct experiences but revealed general scenarios that were followed in their schools under such circumstances. For example, a senior teacher from School-B said, "...Suppose any teacher is unwell and her work is pending. At times in-charge allocates the duty... 'Ok you just help her out to finish her pending work'. At times, teachers at their own level only help you... 'Do not worry. I will correct your papers' or 'you just do not worry'."

The 'functions of mentoring' that **emerged** from the inductive thematic analysis of interview data were:

- 1. Agreed classroom observations: Planning of 'agreed observations' is prominent in mentoring. 14 interviewees enlighten 'agreed classroom observations' in the praxis in their schools along with other 'non-agreed observations'. For example, a member of a private school management said "...There are some informed observations and some uninformed observations". Similar ideas were revealed by a senior teacher from another private school. She added "...Sometimes we do inform but sometimes we go to observe classes without intimation" (T).
- 2. Frequent observations: 9 interviewees referred to the exercise of this function among them. Mentoring, either formal or informal, involves frequent classroom observation as compared to supervision. The statements of interviewees aligned their actions with this function of mentoring. For example, a teacher from School-C mentioned that "...I have to do it [class observations?] every day...three classes for sure". Another teacher from School-D added that "...Principal checks daily and SI

[school inspector?] once in [a] month".

The interviewees also agreed that the observations were more frequent for the new teachers as compared to those who were employed for a long period of time. For example, an interviewee who was in a managerial role in School-B said, "...New teachers are observed very frequently". The senior teacher from the same school also agreed with this statement and said, "...For new comer it is thrice in a week or four times in a week".

It was not the case with this school only because a member of school-management who was a counsellor in another school, i.e., School-C, also referred to this concern as "...For a new teacher, 2-3 times in six months and then you may or may not" observe them. However, there was no doubt that the frequency of observation varied among schools along with work-experience.

3. Reversibility of role: Role reversal between a junior and a senior is unique to mentoring in comparison to supervision, coaching and tutoring. It may be exercised by helping seniors to learn and by observing their classes. The existence of this function was indicated by 13 interviewees. For example, "...So a new application they [juniors?] taught me otherwise I was not able to" (Interviewee from management of School-A).

This interviewee also agreed that the same person could be a mentor and mentee at the same time in the following words: "...We cannot categorise. They [senior and junior?] both are mentor and mentee to each other. Some junior teachers actually get the chance to observe the senior's class. But they are not filling in any Performa".

A senior teacher from a government school said, "...I called another [junior?] person to help me in 'Addition'" and another senior teacher from School-E (a government school) learnt IT skills from a junior teacher. She mentioned her experience as "...Juniors have more knowledge. We can learn computers [sic] from them. We ask them to make us learn and they teach us" (T).

The positive attitude held by interviewees towards 'role-reversals' had been facilitated learning from juniors without hierarchical obstacles. For example, a teacher from School-D shared her views as "... What if junior, [we can] learn from them. Age, post nothing matters. Experience matters to learn" (T).

All such statements affirm the existence of this function of mentoring among the participating teachers.

- 4. Acceptance of positive criticism: Giving feedback as positive criticism and acceptance to it is a strategy used in mentoring. 4 interviewees were engaged in it in their working routines. For example, a junior teacher from School-A said "...I know Mam [sic] said it positively. She understands. A person, who is coming to observe you, has [a] lot of teaching experience. [S]he has been in real life situation so many times. So it is always taken positively". Similarly, a junior teacher from another school said "...Every teacher should. Even though if she is saying badly, you should understand [that] whatever she is saying is for my best."
- of getting evaluated for them is highly supported in mentoring. 13 interviewees highlighted such privilege in their working styles. For example, a teacher from School-A said "... Yes, I do feel free ... There is no gap, there is no loop pole, and there is nothing...no hitch, no hesitation at all. I have not heard that... would somebody report mine work" (T). The same was accepted by another junior teacher from School-C. She said "... Yes, I share. Even I can tell [problems to?] anyone in the school."
- 6. Shared feedback and discussion: In mentoring, feedback is usually shared among participants and agreed feedback used to be filed. These sorts of activities were highlighted by 11 interviewees in support of the 'existence of mentoring' among them. For example, a junior teacher from School–A said "...Yes, we have a proper report. We [also] get a copy of the report that we can always refer [to]. They [facilitators?] share with us. They discuss and afterwards they provide written feedback and then the report would be given and we will sign it." Similarly, a senior teacher from another private School-C mentioned "...I got my class observed. My facilitator was there and she showed me whatever she has written." Apart from the teachers, the members of school managements also highlighted such trends in their schools. For example, an interviewee who was a counsellor said about feedback that "...They do [share?] it."

• Some Specific Mentoring Events

One interviewee shared a specific incidence to support the embedded 'existence of

informal mentoring'. A junior science teacher from the private School-C described her experience with her HOD. They both used to try new 'laboratory experiments' in her previous school with support of each other. She also added that in her present school, a computer teacher was guiding her to learn C++ (i.e., a computer program) while she being a science teacher was facilitating the learning of her colleague with the concept of 'inertia' at the same time. Such an exchange of unequal knowledge clearly supports the 'existence of mentoring' among them as per the concept elaborated on by Bozeman & Feeney (2007).

• Written Policies to Mentoring

Interviews not only affirmed the existence of mentoring among the participating teachers but also elucidated that the schools (except School-A) did not have written policies to refer to mentoring but still exercise it in practice. In response to the inquiry regarding this issue, 12 interviewees responded. For example, a junior teacher from a private School-B said "...Not exactly...nothing noticeable. It [policy for mentoring?] is there because it's functioning so smoothly so may be not noticeable for me".

Another interviewee from the management of private School-C said "...We speak, we share. No, we do not have [it] in written [writing?]. We just practice it [mentoring?]". The senior teacher from the same school also agreed to it and mentioned that "...I have not signed anything but there are lot of unsaid things which possibly work. Now there are lot of practices that are not anywhere on paper. So it becomes a policy somewhere".

• The Perspectives from Documents

The documents from the two private schools showed mixed results. School-B did not have a written policy for mentoring but documents from School-A alluded to an opportunity to mentor teachers with experience of 0-3 years for the prescribed professional areas. However, there was no mention of other details such as frequency of meetings, matching criteria, set targets, observation standards etc. for this facility which should be known for formal mentoring scenario. Moreover, this opportunity was not called mentoring in the school system because an interviewee from the management of this school said about the terms 'mentoring', 'mentor' and 'mentee' that "... We do not go by these terms. It is just in

our system that these things [practices?] keep going". This could be the reason that she, as being in management, was more aware with the mentoring process and familiar with its technical term compared to other interviewees from the same school. It seemed that formal mentoring was considered by the school at policy level albeit the teachers were not introduced with it. Overall, the collected documents from both the schools provided information about planned activities for the development of teachers that were in action at that time. The noticeable activities from the documents were:

— School-A (appendix-13)

- 1. Staff exchange programmes with different schools in other countries such as the UK, Germany, France, Italy, Singapore, Australia, Russia, and New Zealand.
- 2. Annually planned 'Teacher's Development Programme' that used to be conducted throughout the year.
- 3. Organisation of a school forum which was called STEP (School Teachers Enrichment Programme) to regenerate the insight of teachers through interaction.
- 4. A well-planned feedback record form for classroom observations.
- 5. Mentoring was considered for new employees (i.e., experience of 0-3 years) in the form of "Lesson planning and its presentation in sync to the school mission, awareness of the school process and procedures related to the concerned class level and awareness of school resources including the ICT for integration in the teaching-learning process".
- 6. Presence of facilitators for the teachers.

— School-B (appendix-14)

- 1. Policy for workshops and seminars.
- 2. 'Classroom observations registers' to maintain a track record for all the teachers.

Interestingly, it was noticed that the interviewees from the private schools shared more mentoring experiences. It was also in the plan to generate comparative analysis among all the six schools and between two types of schools. Therefore, the results for this purpose have been listed below.

3.2.1 Comparison for the Extent of Mentoring

— Between Six Schools

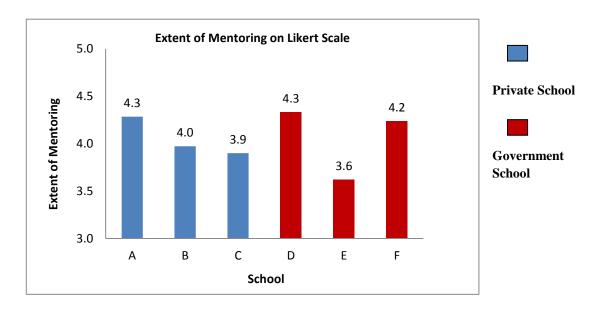


Figure 3.2 Extent of Mentoring among Six Schools

The descriptive analysis showed that the extent of mentoring received by teachers was almost the same among all the six schools with a minor variation of 0.7 (4.3 [School-A and School-D] -3.6 [School-E]: Figure 3.2). This minor variation was invaluable because a one-way ANOVA to the same target did not reveal a statistically significant difference (F (5,165) =1.562, df=5, p>0.05) among the schools.

The results from the interviews also corroborate the findings from the questionnaires in this regard. Comparative analysis of the above listed statements from the interviewees from all six schools also showed the involvement of teachers in mentoring with somewhat similar enthusiasm.

Between Government and Private Schools

Although private school teachers seemed somewhat more mentored than the government school teachers but the difference was not found statistically significant (t= 0.263, df=169, p>0.05) in an independent samples two tailed t-test.

Notwithstanding the results from the questionnaires, the interviews suggested otherwise outcomes. In total, 5 interviewees from both types of schools referred to this issue and all

of them revealed that there was more mentoring taking place among private school teachers as compared to the government school teachers. For example, a junior teacher from School-A said "...I have friends from government schools but I am sorry to say that they do not have that privilege of getting mentor by others."

The interviewees also highlighted the mind-sets of the government school teachers towards mentoring or CPD as a whole, for example, another interviewee from the management of the same school said "...Government school teachers...they are not 'teacher-centred' or 'mentor-centred'. They are always like...'we are at the receiving end'." This interviewee also added that "...on the large scale...more of them are doing supervision and part of mentoring. In [the] government schools...it totally depends on the inspectors. Once in a while they observe. [They observe?] once in a session only or once in a year and that is also not for all the teachers". This evidence also indicated that there were inequalities among the government school teachers themselves for securing mentoring, or one should say CPD, support.

The interviewees from the government schools also agreed with such differences; however, they did not use the term mentoring. For example, a junior teacher from School-D said "... There is a difference in the government and private schools for the timings, rules and regulations" for teachers with regard to self-development.

However, the information obtained from private school teachers regarding government school teachers or *vice-versa* cannot be treated as reliable and unbiased without corroborating evidence. Consequently, the statements provided by an expert from Delhi University (who had also been an employee at both types of schools in her previous career) can be considered to be neutral and authentic regarding this issue. However, the effect of self-bias from this interviewee cannot be ignored without further exploration with numerous experts. Nevertheless, obtained statements helped to draw conclusions for the concerned enquiry within the limits of this project when both types of schools were required to compare. This interviewee added "...In public [private?] school, they make sure that all the teachers of all the branches get together and work on some concrete aspect, and in the government [school], it is only the seminars which [are] held just twice a year."

In response to "Where did you feel more comfortable as a new appointee teacher?" she replied, "...I was more comfortable with the public schools". The reason she gave was interesting. She said, "...You are getting that input to grow yourself, to learn many more things. May it's with respect to technology or maybe it's with respect to new methods, they

tend to make an effort in public school for the professional development of their employees. In the government schools, it was a satisfaction from the heart that I am teaching someone who really require to be taught in a different way but efforts were all mine own. I was not getting some incentives or somebody was [not] encouraging me [to do so]. There I have to do [all] with my own initiative. There nobody is going to tell you to teach this way or that way or even to teach. In government institution there is no one is going to keep a check on you so you hear your own voice... 'Are you taking into consideration?' or 'Are you just coming, writing on the blackboard and let them copy it out'. This is what is the actual thing going on in most of the government schools."

She also added, "...There are regular inspections in the [government] schools. Sometimes the inspector does come but when the inspector is going to come then it is make sure that school is all change and even the classes which teachers are taking during that time they are well prepared. I am not saying for everyone but mostly this is the major situation that you will see in the government schools. The way the interaction ought to be there, is not."

• Overall Results about the Existence of Mentoring

Although participating schools lacked a pronounced and manifested concept of informal mentoring, the outcomes informed its existence in practice among teachers from all the six schools through their involvement in the considered and emerged 'functions of mentoring'. The responses of the majority of teachers in the questionnaire for engagement in the considered mentoring functions were from the categories of 'Frequently', 'Most Frequently' and 'Always' on the Likert scale. Interviews also endorsed the same findings among them.

Most importantly, the confirmation of the opportunities for experiencing 'reversibility of roles' between the observer and the observed (which is a unique feature of mentoring as compared to supervision, coaching and tutoring) by the participating teachers vindicated the existence of informal mentoring among them.

Results comprehensively affirmed that informal mentoring conceptualised among Indian school teachers was in the form of providing professional help, assistance, advice, providing and sharing feedback, reflection, long-term support, agreed and frequent observations, reciprocity in roles, acceptance of positive criticism, free expression, and personal care and encouragement.

The involvement of the teachers in informal mentoring varied with the type of school they

were employed in. The private school teachers were more involved in it as compared to the teachers from the government schools.

3.3 Familiarisation with the Term 'Mentoring'

This issue was investigated through the 15th item of section-2 in the questionnaire and Q.5 in the interviews. The Likert scale item was 'I understand the concept of mentoring' and the response to it is shown below in Figure 3.3. The rationale behind designing this item and labelling the scale in this particular way has already discussed in section 2.6.1. Overall, 99% (=6+33+60) of teachers confirmed their familiarisation with the term 'mentoring' when data were analysed in MS-Excel. Interestingly, in contrast to the results from the questionnaires which highlighted a profound familiarity of teachers with the term 'mentoring', interviews revealed very contradictory results.

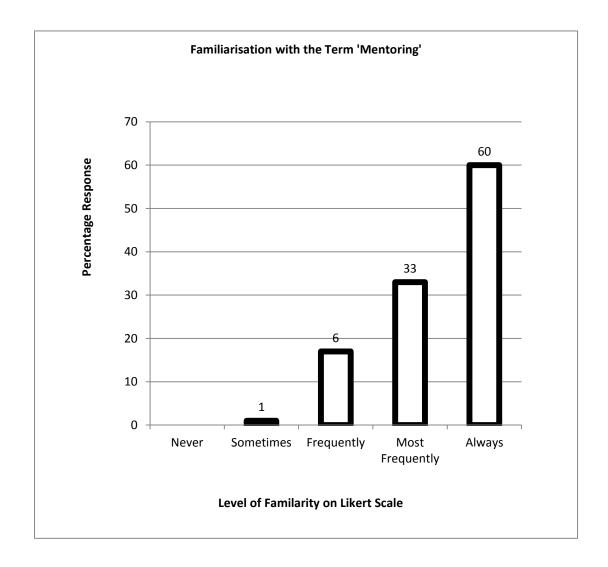


Figure 3.3 Familiarisation with the Term 'Mentoring'.

Only 7 of the interviewees were more familiar with the term 'mentoring' than others including the interviewee from the 'School of Education, Delhi University'. This interviewee described a mentor as "...A person who has richer experience than yours [and] is sitting with you and who is sharing [experience where you are] as a learner or as a new person."

In-line with previous research (see section 1.3.1), the interviewees who admitted to exercise mentoring in their daily routines were unfamiliar with the assigned term with regard to their actions, i.e., 'mentoring'. For instance, it is exemplified earlier in this chapter to endorse the existence of informal mentoring between a science teacher and a computer teacher who exchanged unequal knowledge with each other for 'the concept of inertia' and 'C++' respectively in School-B. However, her reply to the question "What is mentoring?" was "...Mentoring....judging or something like that? No [idea?]."

An important fact that mentoring occurs unobtrusively in Indian system and teachers do not use the term 'mentoring' officially was also highlighted in the interviews. For example, "...In our Indian system, it comes automatically and here it is not like that he is your mentor or she is your mentor. We do not go by these terms. It is just in our system that these things keep going" (An Interviewee from School-A). Similarly, a senior teacher from School-C said "...I can approach to some of my co-teachers to seek that help. I may not have a person coming straight for mentoring or so called mentor [or to say] this is my mentor."

Such observations also affirmed the inconspicuous existence of informal mentoring among Indian school teachers and vindicate the possibility of more teachers in India being unfamiliar with the term 'mentoring'.

3.3.1 The Comparative Familiarisation with the Term

Between Six Schools

The familiarisation with term 'mentoring' between the six participating schools did not vary much and the results have been shown in Figure 3.4 on next page.

A one-way ANOVA for the same enquiry also confirmed that the difference between them was not statistically significant (F (5,165)=1.268, df=5, p>0.05). However, interviews unfolded contradictory findings to the questionnaire. Teachers from School-A were most familiar with the term 'mentoring' followed by School-B and School-C whereas the teachers from School-D, E and F were not so familiar with it.

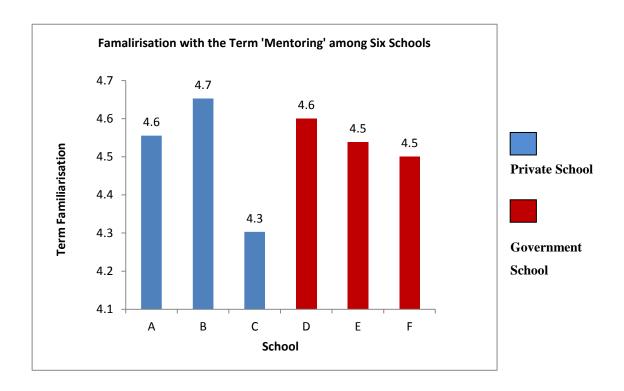


Figure 3.4 Extent of Familiarisation with the Term 'Mentoring' between the Six Schools.

Between Government and Private schools

The outcome to a comparison between government and private schools for the same inquiry through descriptive statistical analysis revealed no difference between them. However, in an independent samples two tailed t-test private school teachers appeared slightly less familiar with the term mentoring as compared to the government school teachers but the difference was not statistically significant (t= -0.111, t= 169, t= 0.05). Notwithstanding the results of the questionnaires, interviews showed a different perspective. The interviews highlighted a noteworthy difference between the two types of schools for this concern.

Private Schools: 6 interviewees from the private schools recognised the term and 4 of them even defined the word 'mentoring'. For example, "...A mentor is a person who is a guide, who understands the school, understands the expectations and organisational goals and share[s] [experience] and take[s] them [mentees?] towards the goal by self-disclosure, by being there, by guiding, by coaching at given times, by helping, [by]

supporting and helping them slowly step by step" (An interviewee from School-C). It is apparent that this interviewee was also well aware of the fact that coaching is one of the skills of mentor. Another interviewee from School-B also defined what mentors are. She said "...Mentors are basically guides who help us."

These teachers were also able to present the characteristics of the mentor. For example, "...I will just ask for two things empathy and reflection. If these two characteristics [are present] in any of the individual, they could be mentor" (An interviewee from School-A). Furthermore, they were also able to recognise their mentors in the school. For example, a senior teacher from School-B said, "...Mentoring means...somebody guiding you to do your work correctly. According to me, our in-charges and principals, they are our mentors. They do come and give us positive suggestions."

These teachers were also aware of the fact that they may not have a person called 'mentor' but mentoring is existing among them. For example, a senior teacher from School-C said "...Mentor possibly the word itself suggests that somebody is there to help you and guide you. I may not have technically someone guiding me but through a lot of indirect means you happened to be mentored."

Government schools: Teachers (N=6) from these schools showed less awareness with the term 'mentoring'. For example, a junior teacher from School-D said "...*Mentoring...Have not heard*" (T). Another senior teacher from the same school said "...*Mentoring...means*?"

The response of a senior teacher from School-F was "... What is Mentoring? Department does not have mentor. Mentoring...do not know" (T). The junior teacher from this school said, "... Mentoring [thinking deeply]... does not happen" (T) whereas the responses to the execution of various functions of mentoring from this interviewee were positive. The interviewee from School-E (who represented the viewpoint of the management for the government schools) was also not very aware of the term 'mentoring' and said "... Mentoring [thinking]....do not know."

• Overall Results of the Familiarisation with the Term

With regard to familiarity with the term 'mentoring', the results highlighted a situation where teachers were less familiar with the officially assigned term to their actions as 'mentoring'. However, teachers from the private schools were more familiar with it as

compared to the government school teachers. The reasons for such a result have been discussed in Chapter-4.

3.4 The Effect of Demographic Factors

Based on literature review, the addressed demographic factors to examine the effects on the extent of informal mentoring received were age, work-experience, teachingqualifications and teaching-subject.

The outcome to a one-way ANOVA (Table 3.5 below) for the aforesaid factors from the questionnaires has shown no statistical significant difference in the extent of informal mentoring received among the various groups of teachers. However, some general patterns are observed through the comparisons of 'Mean' values across groups which have been listed in Table 3.5. Contrary to the results from the questionnaires, interviews showed different dimensions for two of the considered factors. The interview statements in support of section 3.2 above for the extent of informal mentoring received by teachers were compared across different groups of the factors considered for this purpose and the outcomes have been detailed below.

- **Age-group**: Interviewees (N=9) who were older than 35 were more engaged in informal mentoring as compared to the teachers from the other age-groups. For example, an interviewee from the age-group 36-40, added her experience of being mentored by others in a tacit manner. She said "...I think that is the excellent way. If somebody else is doing something positive and I am not aware of it, I am adopting it naturally. We are doing it for the sake of kids. We are improving ourselves, our teaching [and] our skills. Our school is like that."
- Work-experience: 13 interviewees had a great deal of work-experience and the remaining 3 had recently started their teaching-career. All the veteran teachers shared some mentoring experiences but for the new teachers, that was not the case. Two of the three new teachers experienced some form of mentoring while the third did not have any such privilege.

This interviewee was a new teacher in a private school and said for her previous school that "...I was compared to the senior teachers. They [seniors?] should come to me and explain to me before I have started [work] when I [was] new and [it was] first time [for me]. I have not got any such kind of help there [in the previous school].

Table 3.5 Extent of Informal Mentoring across the Demographic Factors

	Affecting	Total	Number of respondents per C	Froun		Results	Specific Comments
	factor	respondents	respondents per C	поир	Mean value	Results	Specific Comments
	(variable)	(out of 171)	Group	N	(out of 5)	ANOVA results	
	(variable)	(out of 171)	<25	28	4.18	ANOVATESUIS	
			26-30	30	4.10		
			31-35	25	4.20	F (6,164) =0.423,	
1.	Age	170	36-40	29	4.03	df=5, p>0.05	
1.	(in years)	170	41-45	31	4.23	u1-3, p>0.03	
	(iii years)		46<	27	4.26		
			40<	21	7.20		There was no statistical significant
							difference found for the considered
			<1	12	3.92		demographic factors among groups of
	Work	169	1.1-5	41	4.07	F(4,166) = 0.915,	teachers in relation to the extent of
2.	experience		5.1-10	24	4.38	df=4, p>0.05	informal mentoring received. However,
	(in years)		10<	92	4.14	, F	the 'Mean' values suggested particular
							trends in the data. For example, the
			DE 1	100	4.20		teachers who were older than the age of 46
			BEd	120	4.20		or were with more than 5 years work-
3.	Tr1-1		BElEd MEd	11	4.00	E (6.164) 0.000	experience but with less than 10 years or
3.	Teaching	153		2	4.00	F (6, 164) =0.898,	were with Mathematics as a teaching-
	qualifications	155	BEd and NTT NTT	8	3.75	df=6, p>0.05	subject were most engaged in mentoring
			· ·	3 9	4.67 4.22		as compared to others. Only further
			Others	9	4.22		investigation can provide a clearer picture.
			All Subjects	68	4.19		
			<1	16	4.13		
			Maths	12	4.33	F (8, 162) =0.468,	
4.	Teaching	170	Science	20	4.00	df=6, p>0.05	
	Subject		Social Science	9	4.22	01 0, p. 0.00	
			Language	41	4.12		
			Eco	1	3.00		
			Others	3	4.00		

Later, I had to go. I had to approach them but as a young one I was expecting that". She also highlighted the difficult situation for new teachers. She added "...Many of them told me, '...because you are new; you are getting lot of extra burden which old teachers are not getting'. My in-charge used to pass on the burden on me... 'Go at home, you are young. You can do it. I have family. You are unmarried'. They can seek help because you are young [and] you can do it but burdening [and] doing it purposefully [is wrong?]".

This interviewee was not only getting extra workload from the seniors in her previous school but was also scared of them in her present school during classroom observations. She expressed her fear as "...If I am standing and teaching, and somebody is observing me, it's very dangerous. It's very scary. You cannot pay attention on the student. I told Mam [sic], who was observing me, that I was really scared. I was really nervous and everything was blank. I turned towards the board and I was thinking that what we were about to do today? I forgot everything."

- **Teaching Qualifications**: The teaching qualification of most of the interviewees (N=12) was BEd. However, the involvement in mentoring was somehow equally addressed by all the interviewees. For example, in support of exercising the function of mentoring called 'freedom of expression' one teacher said "... This is for sure. If I know I am right, I will continue my thing. I will try to convince her [senior teacher?]. I feel this is right so definitely I must be having some point in my view that why the hell I am right." (A junior teacher, BEd).
- Teaching Subject: All the interviewees (N=15) with different teaching-subjects were experiencing informal mentoring except a teacher of Physics in School-B who seemed to be receiving less mentoring. She got less support from her senior teacher in dealing with problems. She expressed herself in the following words: "...Same kind of thing happened in the last [term] exam [examinations]. I did very strict checking [marking?] and this was not accepted here [in this school]. I had a discussion with my Head [of the Department] and maybe she was convince[d] may be she [was] not but I had put my point."

• Overall Outcomes on the Effect of Demographic Factors

Teachers older than 35 and those who had more work-experience were very involved in informal mentoring compared to the others, especially than younger than 30 and new teachers respectively. The teaching-qualification and teaching-subject did not reveal any valued differences between teachers to make them engage in informal mentoring.

3.5 Level of Satisfaction with Current CPD Practices

It was found that 99% of teachers were content with the current CPD practices in which they were engaged when the issue was explored through the following Likert item in Section-2 of the questionnaire.

Statement	N	S	F	VF	A	% response
I feel happy and satisfied about my professional development with the use of current practices in the school.	0	2	15	57	97	100

12 interviewees addressed this concern and revealed similar perceptions to outcomes from the questionnaires. For example, a junior teacher from School-A said "...At this point, I am satisfied. I am not asking for more. [I am] getting a lot. I am satisfied." Similarly another teacher from School-B said "... Till now I have not felt any problem and this is honest." A junior teacher from School-D responded to this enquiry in the following words, "...Satisfied with current way of working."

However, one teacher from School-E demanded changes to the existing CPD practices and said "...There should be something else. Seminars seem time waste sometimes. Children are not learning anything. There should be training to make children progress [in a] better [way] and [for] how teachers can do better?" (T).

3.5.1 The Comparative Level of Satisfaction

— Between Six Schools

The comparative analysis among the six schools (Figure 3.5) showed that the teachers from School-E were least satisfied (3.7 on Likert) with present CPD practices compared to other schools and the level of their satisfaction differed immensely from School-A and School-B (4.6 on Likert). A Welch ANOVA for the same enquiry showed that difference among six schools was statistically significant (F (5,165)= 4.265, df=5, p= 0.039). Posthoc Games-Howell test revealed that the level of satisfaction is statistically significantly

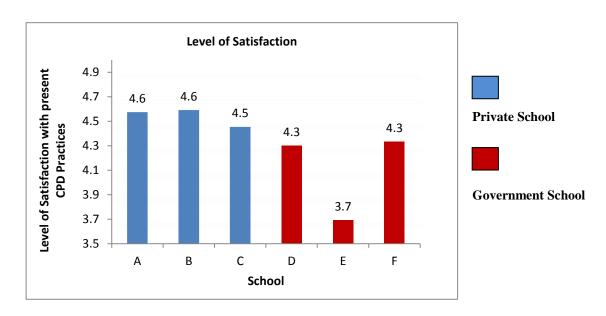


Figure: 3.5 Level of Satisfaction with Present CPD Practices between the Six Schools

lower (p=0.049) in School-E (3.69±0.94) than in School-B (4.59±0.53). This indicated that the individual school to CPD arrangements of teachers varied which had an impact on their level of satisfaction with present CPD practices. Such arrangements vary significantly between School-E and School-B. Interviews also endorsed this finding because the interviewee from School-E was found demanding transformation to present CPD practices (see aforementioned statement in section 3.5)

Between Government and Private Schools

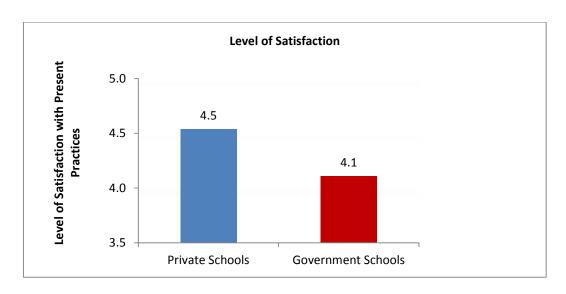


Figure: 3.6 Level of Satisfaction between Two Types of Schools

Figure 3.6 through descriptive statistical analysis shows that private school teachers were more satisfied with the existing CPD practices than government school teachers. An independent sample two-tail t-test showed that the difference was statistically significant (t=3.02, df=44, p=0.004) between the private schools (M=4.5, SD=0.63) and the government schools (M=4.0, SD=0.85).

The analysis of interview statements also vindicated the findings from the questionnaires when the private school teachers were found more content with the existing CPD practices than the teachers who were employed in the government schools.

Overall Level of Satisfaction

Teachers were satisfied with the present arrangement to CPD practices. The level of satisfaction varied statistically significantly between the six schools and between the two types of schools. The government School-E varied greatly from the private School-B in this regard.

3.6 The Preferences to CPD Practices

This issue was inquired by Section-3 of the questionnaire which consisted of 20 Likert items to represent 10 common features of the three CPD practices (i.e., supervision, informal mentoring and formal mentoring) on a scale from 1=least preferred to 6= most preferred and through the interview questions 6 to 8. The results for each feature have been described below.

1. Solemnity and frequency of evaluation: The following 3 items investigated this feature and based on Table 2.2 the results for it have been shown below.

Likert items	Points	P	Pattern		PIM^3	PFM^4	PS ⁵	NR^6				
	counted to	_	\longrightarrow		\longrightarrow		\longrightarrow					
Written feedback of your overall												
performance by a colleague.												
Brief and direct evaluation of your	1=2= IM	_	C	Б	70/	C 40/	200/	10/				
teaching practice by a colleague	3=4=S 5=6=FM	1	S	Г	7%	64%	28%	1%				
Frequent and continuous evaluation of	J-0-11VI											
your progress.												

³ PIM- Preference to Informal Mentoring

⁴ PFM- Preference to Formal Mentoring

⁵ PS- Preference to Supervision

⁶ NO-No response

It was found that maximum teachers preferred formal mentoring with regard to this feature. This feature was also referred to by 12 interviewees when their preference for 'getting assistance' and 'being evaluated' was explored for career-development. It was a pre-decided theme 'Assistance or Evaluation' to address this issue in the interviews. Based on the literature review in section 2.6.2, the observed pattern for the extent of evaluation was: Informal mentoring < Supervision < Formal mentoring. However, the component of 'being assisted' was also taken into account along with 'evaluation' in the interviews. The following pattern was employed in the interviews:

	Informal Mentoring	Supervision	Formal mentoring								
Level of evaluation											
(From Table 2.2)	* -	+ +*	+++								
Level of Assistance	+++	-	+								
*'+' shows existence and '-' points absence.											

Therefore, the preference to 'evaluation only without being assisted' corresponded with 'supervision' while to 'assistance only without being evaluated' corresponded with 'informal mentoring' whereas a mixture of both represented a preference to 'formal mentoring' because it includes being assisted disparately and then get evaluated enormously. There were mixed-opinions observed for this theme. The maximum interviewees (N=12) preferred being assisted first followed by an evaluation of their performance which was in-line with the features of formal mentoring and corroborated the outcome from the questionnaires. However, the space given to both ends varied.

Evaluation > Assistance: 5 teachers preferred being evaluated most of the time with less assistance. For example, "...Evaluation and assistance both but evaluation mostly because it acquits 'who you are?' and 'where you stand?' and 'where you have to go?' It sets your goal in life." (A senior teacher, School-A). Two of them preferred assistance only if it is demanded otherwise just evaluation was preferred. For example, "...Assisting means we do not want a mentor or CPD to spoon feed the teacher. That initiative should come from the teacher['s] side. She has to demand that otherwise it should be evaluation." (A senior teacher, School-B).

Assistance > **Evaluation**: 7 other interviewees preferred assistance most of the time

and got evaluated later for the purpose of rewards and promotions only. For example, "...No, we do not evaluate. For us evaluation would be for promotion. Coaching, mentoring, reflecting, feedback, and interaction should be a continuous process. It is more about learning and feedback" (An interviewee from School-C). The very same was acknowledged by a senior teacher from the same school. She said "...Assistance is better. The minute you [start] judging me, [it] would certainly also create an issue at my end. We keep assisting each other but there are times when we want to be appreciated for that. It may not always be a monetary reward but somewhere being said or acknowledged for the fact."

Similar preference was confirmed by a member of management from School-B. She said, "...First assistance. Helping each other and then evaluation is also very important to see how much the teachers have implemented whatever she has been assisted in. If somebody is scared of evaluation then I think she will work better. She will be working more to achieve her goals."

The Expert from the School of Education also acknowledged the same but this interviewee specified the kind of evaluation that should be used. She said "...The kind of evaluation [that] would be given will make a difference. Instead of quantitative if it's a qualitative evaluation, it is better because it will lead to an analysis 'how far the entire process has been used?' So I would not say it should be evaluative but instead of quantity it should be quality."

Only Assistance: Only 1 interviewee who was a senior teacher in School-D preferred assistance alone but was not having any problem if evaluated. She said "...Both, assistant and evaluation, are needed but if you have choice then assistance. We do not want evaluation but if he [principal?] has it then no problem".

Only Evaluation: 3 others did not give any space to assistance. For example, "...Assistance and evaluation have differences. To tell, what to follow? Evaluation should be there" (A junior teacher, School-D, T). Similarly, another interviewee who was a junior teacher in School-E said "...Evaluation is good. We come to know that 'has work done or not?' or 'what is the result of the work?" (T).

The form of preferred feedback: This issue was referred to by 7 interviewees and 3 of them preferred written feedback and also stressed to realising the importance of it

in a positive way. For example, a junior teacher from School-D gave a convincing reason for preferring written feedback. She said "...People are more comfortable with oral feedback but they do not take it seriously sometimes." This interviewee also related this concern with career stage. She added, "...For new teachers, we take orally so that they become comfortable and then we start with written things." Other two interviewees stressed sharing and discussing the written feedback to make progress. For example, a junior teacher from School-C said "...It should be shared with teacher and you should also listen to her so that we both learn". Such actions are common in formal mentoring.

The interviewee from the School of Education not only stressed written feedback but also encouraged teachers to perceive it positively. She expressed her views as: "...It should be written. One has to think really positive concrete feedback. Even tell them [teachers?] what is the emphasis of this written feedback. They [teachers?] should know it is not going to cut their salary [or] to make them out of the school or they will be suspended at the end of the day. So that fear [should] not come. They [observers?] have to tell that it is for their growth, for their professional development. Then nobody would say 'no'."

However, an important concern was raised with regard to written feedback by a junior teacher from School-F. She preferred oral feedback because she considered written feedback free of emotion and difficult to understand. She said "...Feelings do not come in written. 'Who said?' and 'In what way it has said?' Is the person helping to understand or taunting?'" (T).

2. Time and Effort requirements: The preferences of teachers (65%) corresponded with formal mentoring when this feature was explored through the following 2 Likert items.

15 interviewees also referred to this feature with mixed feelings.

Likert items	Points counted to	Pa	atte	rn ▶	PIM	PFM	PS	NR
Spend more time on your professional development.	1=2=S							
Increase in workload by involving in professional development practices.	3=4=IM 5=6=FM	S	Ι	F	28%	65%	6%	1%

Acceptance: 3 interviewees welcomed such an investment more than others whereas 2 others demanded one or two conditions for it. For example, an interviewee from the

management of School-B said "...I am not afraid of work so it really does not matter. Teachers are not overloaded". Another interviewee related it with skills and time availability with the teachers, she said, "... If I am giving this person this task then he or she is able to do it effectively, not for the sake of doing it. That is only possible if he or she has proper time availability and skills because sometimes absence of skill increases your time" (An interviewee from School-A).

Individual Capacity and Career-Stage: Sometimes (N=3) it was left up to an individual teacher to decide her time and effort inputs. This was because of her work schedule which varied with the class they teach, involvement in non-academic roles and the type of school in which they were employed. For example, "...It depends upon the teacher if she wants to work or not? I feel you can learn things; you can do things unless until it is [not] becoming heart breaking, killing your nerves and headache" (A junior teacher, School-B). Another interviewee from School-C related such investment with the career-stage. She said "...The kind of mentoring that [senior] teacher would need and a fresh teacher would need, are two different things."

Affordability of Recipient: Two other interviewees related such interests with the person with whom they needed to work. For example, "...There are times when you do it but you may also feel disappointed. You may also feel that I may be wasting a lot of time. There are times when you realised probably that this person may not be able to do that. So it does create a lot of discomfort." Similarly, another junior teacher from School-F said "...It depends on 'how the person is?'"

Complete Refusal: Such availabilities were entirely denied sometimes (N=3). For example, "...Not always. Situation is not same. We have limited time and so much of checking, so cannot do" (An interviewee from School-D). Another senior teacher from School-C also completely denied such investment in the following words, "...No, we are already overloaded. Forget it. There is already additional tension on our head, so forget it." She only wanted to be a mentor without additional workload. In response to the query to become a mentor for somebody, she said, "...If you exclude me from any additional task, only then. I would certainly do not want my workload to be added on."

The reason for such straightforward responses seems the issue of extra non-academic duties, for example, "...It is ok in a limit but not always. We have syllabus, paperwork, books and copy checking, dress-distribution, report-writing and other duties. Idea is good to learn and for a change [but we have] census, BLO, election, polio duties. Workload is much" (A junior teacher, School-E, T). The same concern was also raised by the Expert from the School of Education. She said "...We need to take care that mentoring and supervision should be respect to the teachers' workload. In government schools, they sometimes have some duties like for elections or for polio, for population census. It requires [a] lot of policy decision."

3. Positive criticism and interventions: The following 3 Likert items explored this feature and the highest level for preference to it corresponded with formal mentoring (55%). This feature was also referred to by 4 interviewees and all of them preferred

Likert items	Points counted to	Pattern	PIM	PFM	PS	NR
Class observation by your colleague (to learn from him or to help him learn). Intervention in your independent working/teaching style by your colleague. Make positive use of criticism of your current teaching practice by a colleague.	1=2=S 3=4=IM 5=6=FM	SIF	32%	55%	12%	1%

receiving positive criticism for CPD. For example, a teacher from School-A said "...These reports are just a part of this life. We just take it as positive only. Don't let it bother us". Similarly, a junior teacher from School-B said "...Every teacher should. Even though if she is saying badly, you should understand whatever she is saying is for my best." The senior teacher from this school also revealed the same preference, she said, "...We have to accept. It will force us to change ourselves".

However, there were some concerns raised about being skilful and diplomatic in providing positive criticism, for example, "...It's not sarcastic if I see myself, I am a person who is very hyper about it, very excited about it so it is important for the other person to calm you down also" (A teacher from School-C).

4. Frequency of interactions: The Likert item shown below explored this feature and the results showed that the preferences of teachers aligned with formal mentoring (78%). The same feature was also referred to by 5 interviewees indirectly.

Likert items	Points counted to	Pattern	PIM	PFM	PS	NR
Continuous involvement in professional development practices.	1=2=S 3=4=IM 5=6=FM	SI	F 19%	78%	2%	1%

Time-availability: 3 teachers related it to the time availability with them in their circumstances. For example, a teacher from School-A said "...It should be included in such a manner that it is not hindering the work of our school. May be whenever we get free time. When my teaching profession will get over with the students then only I will be able to go to the other work. Obviously it can frustrate you [otherwise]."

Another teacher from School-B also related it to the time availability and said "...We are going to see when a teacher is going to be free. Suppose, if a teacher is already overloaded with so many answer-sheets [and] she has to correct so many papers so during that time we do not want to disturb the teachers. So we tend to see the availability, [the] time teacher can afford." A similar concern was also raised by a junior teacher from School-F. She said "...We cannot observe by leaving class. It depends on time-table" (T).

Agreeability: 2 other interviewees accepted it very positively, for example a junior teacher from School-D said "....If there is benefit by giving time so [I] will try to benefit her. It is like our family so we can manage everything. [Spending] 1 more hour [will not] burden" (T).

5. Commitment towards taking responsibility of other member: Preference for this feature was explored by 2 Likert items which have been shown below. 61% responses aligned the highest preference with formal mentoring. This feature was also referred to by 3 interviewees.

Likert items	Points counted to	Pa	atte	rn ▶	PIM	PFM	PS	NR
Take responsibility for the professional development of your colleague.	1=2=S							
Commitment towards the professional	3=4=IM	S	I	F	33%	61%	5%	1%
development of your colleague.	5=6=FM							

They were ready to take the responsibility for the CPD of other colleague as their job

and as a source of appreciation which is a feature of formal mentoring. For example, a junior teacher from School-A said "... If you have been given the responsibility to take charge of the other person so you have been given that responsibility [by] keeping in mind that you are capable of doing that."

However, the assigned person was mostly held totally responsible for the CPD of others. Such assumptions are also common in formal mentoring. For example, a senior teacher from School-B said "...Our principal has assigned an in-charge. That is the responsibility of the in-charge to get the work done." Similarly, an interviewee from School-C said "...During that mentoring process, it's her [facilitator?] responsibility for sure. Accountability and consciousness process is followed between [the] facilitator and the teacher."

Notwithstanding this, a teacher from School-A thought otherwise. She said, "... You are responsible for your own development. Nobody else. They can only help you in development but they cannot be responsible for your development entirely. So if somebody is guiding us and we are not able to follow that guidance for some reason or other, that's your fault. That person was just coming as a helping hand so that person is not responsible. I am responsible."

6. Level of trust: The following 2 Likert items explored this feature and found that the preferences of teachers corresponded with informal mentoring (78%). 4 interviewees also referred to this feature which revealed mixed opinions.

Likert items	Points counted to	Pa	atte	rn •	PIM	PFM	PS	NR
Trust on your colleague to discuss your professional or personal problems.	1=2=S							
Readily ask for help without the fear of being criticised for your lack of knowledge.	3=4=FM 5=6=IM	S	F	I	78%	18%	3%	1%

For example, "... Seniors ask [for] help. They use to discuss professional and personal problems and seek help. We trust them" (A junior teacher, School-F).

Conversely, two other interviewees were not able to trust colleagues due to politics, for example, "...We do not get much time in the school so cannot trust [other teachers?]. I want to get reserve from politics" (A junior teacher, School-D, T).

The interviewees, who were in the senior roles, also emphasised that trust develops

with time, for example, "... They naturally develop trust over each other [with time?]".

7. Willingness to share information and readiness to ask for help: This feature was explored with the help of the 2 below mentioned Likert items and the preferences of teachers (73%) for it aligned with informal mentoring. Interviews (N=4) also revealed

Likert items	Points counted to	Pa	atte	rn ▶	PIM	PFM	PS	NR
Ask somebody to personally assist you in your professional development.	1=2=S							
Share your teaching experience and knowledge with another colleague.	3=4=FM 5=6=IM	S	F	Ι	73%	20%	6%	1%

that teachers preferred it the most. Interestingly, in such a hierarchical culture as India it was difficult to expect that seniors would prefer to share information and would be ready to ask help from juniors but it was revealed in the interviewees. For example, a senior teacher from School-D said, "...They [juniors?] have more knowledge but no experience. We want to learn from juniors. You need to be open to learn from juniors. We cannot be perfect."

Similarly, a member of management from School-C said, "...Yes, of course, that's why they are [taken] in [the school]. When they [managements?] have taken interview, they know what their strength is. You are looking for what you do not have and that person at the best of advantage, so why not?" The senior teacher from the same school in this regard said, "...I may find someone who may not be that experienced but genuinely good with some particular [aspects]. Then that person happens to be the right person for me to approach."

A preferred pattern to share information among teachers was also highlighted at some points, for example, "...On last working day, we share the things [ideas?] between principal and teachers. We have 15 minutes daily for group discussion" (A senior teacher, School-E).

Similar to the seniors, juniors also preferred to share information and were ready to ask for help from the seniors openly. For example, a junior teacher from School-A said, "...I cannot say that I am not able to talk to this teacher because she is having 15 years experience. As a teacher we have to share [information]". Another teacher

from School-C regarding expressing her weakness to someone in the school said "...Yes, I share. Even I can tell [my weakness to] anyone in the school."

8. Acceptance to reciprocity in practice: This feature which is very unique to mentoring was explored with the help of 2 Likert items that have been shown below. The maximum responses (84%) to it highlighted the preferences of teachers to

Likert items	Points	Pa	Pattern		PIM	PFM	PS	NR		
	counted to		\rightarrow		\longrightarrow					
You can learn from your junior										
colleagues.	1=2=S									
Give equal importance to both,	3=4=FM	S	F	I	84%	14%	1%	1%		
senior or junior, teachers for your	5=6=IM									
professional development.										

informal mentoring. A preference to a high level of reciprocity was also revealed through interviews (N=13) and all of them preferred it irrespective of their rank in the school. However, few raised some practical difficulties which were expected in a hierarchical society.

No Hierarchies: 7 teachers expressed their view to overcome hierarchy in the professional culture. For example, a senior teacher from School-D said "...We could be wrong so they [juniors?] can correct us." The junior teachers were also eager for such opportunity, for example, "...Situation when you [seniors?] are in the class and we get a chance to observe you [with a wow expression]. May be you unconsciously do that we can pick up. Class presence is something else and discussion is something else" (A junior teacher, School-A).

Two others were more open-minded and preferred avoiding even the terms 'senior' and 'junior', for example, "... There should not be senior and junior. If work is 'ok' then it is fine. Age-respect is culture. If there is mistake, it would be corrected even if a junior said for it. But tell privately, not in group" (A junior teacher, School-D).

The interviewees who were in the managerial roles also showed acceptance to reciprocity, for example, an interviewee from the management of School-A said "...N number of minds, N numbers of ways you use. The more idea comes up and you never know who is comfortable with what? Whatever will click you, give you the result".

On Demand: 4 interviewees, both seniors and juniors, believed that such initiation

should only be started if asked. For example, a senior teacher from School-F said "...Till they [juniors?] would not come, we cannot approach. Once they come first then you can help them yourself. They should ask. It is good to be more friendly [sic]" (T). Junior teachers also expressed the similar views, for example, a junior teacher from the same school said "...We cannot go to help them [seniors?]. Do not know how they will take it? Better they should ask" (T).

Egoism: 2 interviewees thought otherwise. They thought reciprocity was impossible due to ego in the seniors. For example, "...Not possible. Ego turns up. 'You are younger than me.' If they want to learn, silently learn, do not tell. Respect seniors. Learn from them and they can also learn from juniors" (A senior teacher, School-E). Similar concern was also raised by a junior teacher from School-B. She said "...They help, they guide, they listen to you but if they are saying something [and] I say 'no', it is wrong. That might create a problem for me. I can say something, I can give a suggestion but I cannot cross-argument. If they are saying something, I have to Ifollow it]."

9. Length of contact with other colleague: Preference to this feature was explored with the help of following Likert item and it was found that 79% of responses corresponded with informal mentoring. However, this feature was not directly referred to in the interviews.

Likert items	Points counted to	Pattern		PIM	PFM	PS	NR	
Involvement in a long term relationship	1=2=S							
with your colleague for your professional	3=4=FM	S	F	I	79%	15%	4%	2%
and personal development.	5=6=IM							

Only 1 interviewee who was a senior teacher in School-C said, "...It should be [long-term], only then it is a true relationship and I will consider the other person as a true mentor. If I am genuinely not taking anything from that relationship, [it] itself cannot be long last. It will become a short-term relationship." Therefore, based on the outcomes from questionnaires and this interviewee, it seemed that teachers preferred informal mentoring for this feature.

10. Priority given to organisations to choose partner: The following 2 Likert items

explored this feature and found that the preferences of teachers corresponded with supervision (51%). Contrary to the results from the questionnaires, 9 interviewees

Points	Pattern		PIM	PFM	PS	NR	
counted to							
_	I	F	S	22%	26%	51%	1%
5=6=S							
		counted to 1=2=IM 3=4=FM I	counted to 1=2=IM 3=4=FM I F	counted to 1=2=IM 3=4=FM I F S	counted to 1=2=IM 3=4=FM I F S 22%	counted to 1=2=IM 3=4=FM I F S 22% 26%	counted to

preferred informal mentoring. In total, 13 interviewees referred to this feature when preferences were explored to 'naturally developed relationship' and 'assigned relationship by the organisations'. Natural development is embraced in informal mentoring and the assignment of relationship is supported in the supervision whereas formal mentoring has a choice to opt for or assign partner.

Natural Development: 8 interviewees preferred natural development of the relationship, for example, "...I will be comfortable with one who is not assigned. It is human nature. When something is given, imposed, assigned, (knowingly or unknowingly), this is the bent of the mind that you are being observed [and] you are being questioned" (An interviewee from School-A).

The interviewees also related their choice to such relationships with the hierarchical workplace culture in India, for example, "...I am comfortable with a person who has not been assigned, the reason being, once you know that 'assigned' word and 'higher authority' word, it makes you conscious. When you know a person has [been] assigned so you feel that you have to listen [to that person]. We can express ourselves but degree of expression can reduce a little bit" (A junior teacher, School-A). Such selection was also thought better by a junior teacher from School-E to get best for CPD. She said, "...Self selection is better because all are equal so we can choose from where we can learn better" (T).

The Expert from Delhi University also preferred natural development of relationships and pointed out the expected issues in such case as well. She said "...Natural will be more productive because they are coming with a natural urge [desire?]. They will have to do something together with a common aim and it is not forced but sometimes

there might [be] some issues of junior-senior or the[re] might be different political issues or human relationships psychology."

Assignment of Relationship: Interestingly, 2 others thought differently and preferred the assigned relationship because according to them naturally developed relationship will not be productive. For example, a junior teacher from School-B said "...Preferably the one which will develop naturally but I do not think that works. To do something, you need to have discipline and assigning job is important. You never know who is assigned, how they are? I mean in what way she will perceive what I want to say. I will not be that open [with that person] but I will do the work. It will increase pressure on me mentally [and] I will be stressed out but then it's ok, you have come here to work only. You have to work".

Similarly, another interviewee from School-A said "...Sometimes a person who has been assigned, he can better handle. Without authority sometimes works are not done". This teacher was familiar with mentoring and preferred formal mentoring to take it as a challenge in this regard. She said "...I will take it [assigned mentoring] as a task given to me but mentoring on your own it becomes a loose rope. It has done sometime, sometimes not. Neither I leant nor the other but in assigned one we will definitely learn something. I think the one that [is] properly planned [is] the best one. Because second one which comes naturally, it happens less often. But that [formal mentoring?] is given to you [with] proper plan that you have to follow this and that. We are also clearer that what we have to do."

Both of them: 2 of them preferred both the types of relationships whether naturally developed or assigned by the organisation, for example, a senior teacher from School-A said "...It depends on protocol of the school but should go for both". Similarly, an interviewee from the management of School-B said "...Both are important. Naturally developed and assigning also. We have teachers of different nature. Some of them help and others [do] not."

Natural but Assignment has Purpose: 1 other teacher preferred naturally developed relationships but highlighted that the assignment of relationships by organisations must have motives which cannot be ignored. For example, "...I think the one which you have chosen. Not the person who has assigned. It has to be willingly from my end

at least [to] see 'what is right for me?' and 'what is wrong for me?'But I am sure if they [schools?] do assign, it would be with some purpose" (A senior teacher, School-C).

To sum up: From the questionnaires, the collective perceived preferences of the teachers from all the six participating schools have been shown below in Figure 3.7.

From this it can be concluded that 98% of teachers preferred mentoring to supervision (=1%) whereas a few (=1%) preferred both practices simultaneously. 51% of teachers embraced formal mentoring and 39% of teachers opted for informal mentoring whereas 9% of teachers preferred both types of mentoring simultaneously. On the whole, the results (from the questionnaires and the interviews) showed that preferences of the

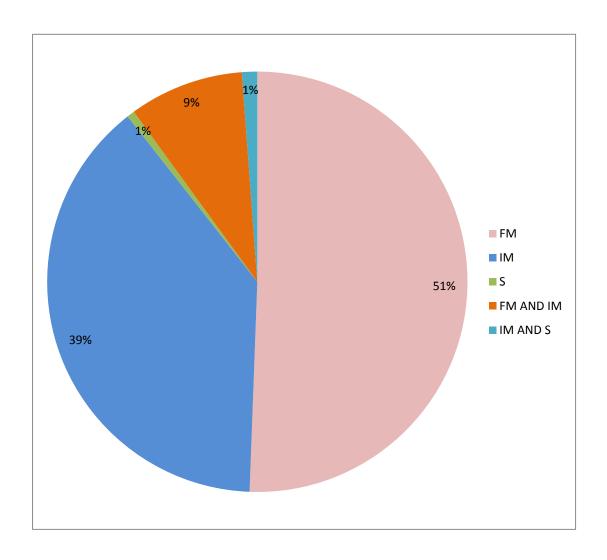


Figure 3.7 Overall Preferences of All the Participating Teachers

participating teachers for most of the considered features of CPD practices aligned with formal mentoring followed by informal mentoring and least to supervision.

FORMAL MENTORING > INFORMAL MENTORING > SUPERVISION

The reasons for such results have been discussed in the next chapter.

3.6.1 The Comparative Preferences

— Between Six Schools

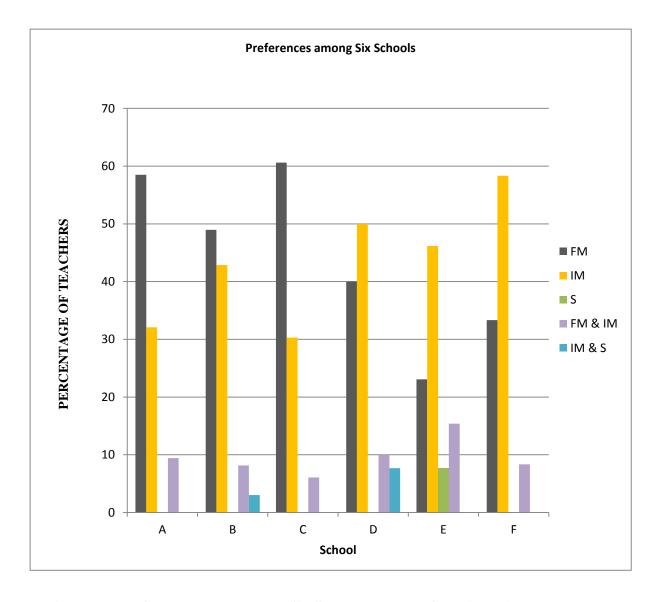


Figure 3.8 Preferences between the Six Schools through Questionnaires

The outcome for the preferences of individual schools to considered CPD practices have been shown in Figure 3.8. The schools A, B and C opted for formal mentoring and informal mentoring was embraced in majority in the schools D, E, and F. Supervision was also negligibly preferred in the School-E. A Kruskal-Wallis test did not show a statistically significant difference (H (5) =9.538, p>0.05) in the overall preferences to the considered practices among the six schools. The ultimate findings from the cross-analysis of interview statements for individual schools have summed up in Table 3.6.

Table 3.6 Comparative Preferences between the Six Schools through Interviews

School	Designation of	Individual Preference	Overall Preference		
	Interviewee		of School		
	Management	Formal Mentoring			
A	Senior	All three practices simultaneously.	Formal Mentoring		
	Junior	Formal Mentoring			
	Management	All three practices simultaneously.	E 114		
В	Senior	Supervision	Formal Mentoring or Supervision		
	Junior	Formal Mentoring			
	Management	Formal Mentoring			
C	Senior	Formal Mentoring	Formal Mentoring		
	Junior	Formal Mentoring			
	Senior	Informal Mentoring			
D	Junior	Informal Mentoring	Informal Mentoring		
	Management	Informal mentoring			
Е	Junior	Informal Mentoring	Informal Mentoring		
	Senior	Informal Mentoring			
F	Junior	Informal Mentoring	Informal Mentoring		

— Between Private and Government Schools

The outcome from the questionnaires to a comparative analysis between private and government schools for the concerned issue have been shown below in Figure 3.9. The results showed a difference in the preferences of teachers to CPD practices depending

upon the type of school of their employment. The private school teachers opted for formal mentoring (56%) in the majority whereas the government school teachers embraced informal mentoring the most (51%). 19% of teachers from both types of schools preferred formal and informal mentoring simultaneously and a negligible inclination towards supervision was also observed in the government schools (3%). Further analysis through a Mann-Whitney U test showed that the difference is statistically significant (N=171, U=1759, Z=-2.634, p=0.008) between the government schools (N=35, MR=104) and the private schools (N=136, MR=81) for the preferred form of mentoring.

The analysis of interviews also revealed similar results. The comparative examination of the interview statements from both the types of schools showed that the private school teachers were more inclined towards the 'formal mentoring' than 'informal mentoring' and 'supervision' whereas the government school teachers desired 'informal mentoring'

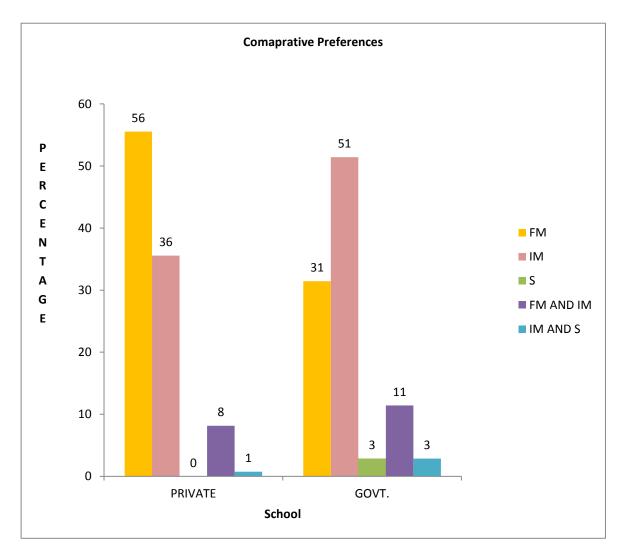


Figure 3.9 Comparative Preferences to CPD Practices between Private and Government Schools

extremely as compare to the 'formal mentoring' and 'supervision'. However, such choices appeared associated with the circumstances of the teachers such as non-academic tasks, extra duties etc. The detailed reasons to such results have been discussed in the next chapter.

• Overall Response to the Preference of Teachers

98% of the participating teachers in the questionnaires opted for mentoring rather than supervision. Only a negligible number of teachers (=1%) chose supervision over mentoring and very few (=1%) preferred both the practices simultaneously. Interviewees also preferred mentoring to supervision. However, the preferred form of mentoring differed between the two types of schools. The private school teachers embraced formal mentoring at maximum (=56%) whereas the majority of government school teachers (=51%) opted for informal mentoring. Interviews also showed similar trends to the questionnaires in this regard.

3.7 Summary

This chapter has concentrated on the results for this research. The next chapter now discusses them in the light of relevant literature to offer a conclusion. It also suggests implementations of outcomes and recommendations for the future work.

CHAPTER-4 DISCUSSION AND CONCLUSIONS

This chapter interprets and discusses the results of this study to draw conclusions. It begins with a snapshot of the project. The recommendations to the participating schools and possible implementation of this project elsewhere have also been presented. Finally, the limitations of the study along with the conclusions and the directions for future research have also been put forward.

4.1 A Brief Description of the Study

This research investigated the 'existence and concept of informal mentoring', 'familiarisation with the term 'mentoring', 'the effect of the demographic factors on the extent of informal mentoring received', 'the level of satisfaction with the present CPD practices' and 'the comparative preferences to supervision, formal mentoring and informal mentoring' among Indian school teachers. In total, six (3 government and 3 private) schools from Delhi were involved.

The applied strategy was a mixed-method pragmatic approach with questionnaires (N=171), documents (N=2) and semi-structured interviews (N=16) administered to the teachers, school managements and a stakeholder. The data from the questionnaires were analysed using descriptive and inferential statistics in MS-Excel and SPSS. The interview data were analysed through thematic analysis in the NVivo software whereas documents were scrutinised manually.

The use of 'mixed-methods' was beneficial because some of the outcomes from the questionnaires and the interviews revealed contradictory results and have provided the impetus for further examination on this topic while similar results from the two methods have consolidated the findings. Overall, such an approach helped to bring out reliable results for inquiries through juxtaposition.

4.2 The Deliberation of Results

The discussion on findings has been laid out in five sub-sections for the 5 research questions respectively which corresponded to the sections in the Chapter of results.

4.2.1 The Existence and Concept of Informal Mentoring

This concern has been inquired by the following question:

Q.1 How is informal mentoring conceptualised among Indian school teachers at present?

Results show that every participating teacher from all the six schools has been involved in informal mentoring. This has been conceptualised for them in the form of providing professional help, assistance, advice, providing and sharing feedback, reflection, long-term support, agreed and frequent observations, reciprocity in roles, acceptance of positive criticism, free expression and, personal care and encouragement. However, the relationships are not apparently observed and labelled as mentoring.

These findings are in contrast to the previous research among Indian teachers where the notion of informal mentoring among them was negligibly observed (e.g., Kapur, 2013). Notwithstanding this, the results are consistence with the findings obtained by Arora & Rangnekar (2015) for the existence of informal mentoring among Indians who were 121 managers. They found that participants were engaged in informal mentoring without the establishment of a formal mentoring program. Out of 14 mentoring functions that have been confirmed among Indian teachers here, 8 (i.e., assistance, advice, proving and sharing feedback, reflection, free expression, personal care and encouragement) coincide with the functions that were found in that research among Indians using Noe's scale (1988). Similarly, 5 functions here (i.e., advice, assistance, long-term support, providing feedback and encouragement), out of 14, coincide with the functions that have highlighted by Haggard *et al.* (2011) to embrace mentoring. The present findings are also in-line with the indication of Ramaswami & Dreher (2010) who have stated that most of the mentoring relationships in India would possibly be informal without being explicitly pronounced as 'mentoring'.

There are a number of possible reasons behind the silent existence of informal mentoring among Indian teachers. Arifeen (2010) suggests that mentors need to play different roles at different times during the mentoring process, and therefore, there is a possibility of lacking public recognition for them in an organisation. Makanya (2004) in two South African schools has also reported that teachers recognised their HODs as mentors but their role was not announced as mentors. Moreover, the fact that mentoring is a complex and multidimensional activity that usually occurs informally among the faculty members have made such relationships go unnoticed on many occasions (Sands, Parsons & Duane, 1991) and this is not only the case with the results obtained in this study.

Prior research (e.g., Ostroff & Kozlowski, 1993; Aryee, Lo & Kang, 1999) also indicates that mentors may work silently and help the mentees without being formally assigned to

do so. It has also been observed on many occasions that supervisors play the role of informal mentors without receiving a formal sanction of it by the organisation (Godshalk & Sosik, 2000). However, there are arguments against a supervisor being a true mentor (Haggard *et al.*, 2011).

Hence, it could be the possible reason that informal mentoring was not noticed in its previous examination (if considered) among Indian school teachers. Moreover, the lack of official recognition of the 'actions of the teachers' as the 'functions of mentoring' may have added to the misconception that informal mentoring is missing among them.

The present results from the questionnaires reveal no significant difference in the extent of informal mentoring received by teachers from two types of schools. Such outcome is consistent with the findings of Arora & Rangnekar (2014) among 205 Indians who were in managerial roles in 5 public and private organisations in North India. The 'organisational sector' was not found to be an influencing factor on the extent of mentoring received by Indians in that study when data were collected by questionnaires.

Notwithstanding this, interviews indicate a different impression. The extent of received informal mentoring varied between government and private schools. There is more informal mentoring exercised among private school teachers as compared to the government school teachers (see section 3.2.1).

The possible reasons for such difference can be understood with the help of the information that has been highlighted by Kremer *et al.* (2005) and Mooij (2008). They both have elucidated the disparity between the mind-set of the Indian teachers from government and private schools in terms of 'job security'. According to them, the Indian government teachers usually have more secure jobs as compared to the private teachers. The private school teachers always work hard due to the fear of getting fired from their job at any time if low performance is observed (Kremer *et al.*, 2005). Therefore, they can be expected to continuously seek mentoring opportunities to learn new teaching strategies in order to be in the profession with their full potential and to secure their jobs. Hence, they have been found more involved in mentoring here.

On the other hand, government school teachers have more job security. Kremer *et al.* (2005) have found that only 1 teacher, out of 3000, was dismissed by one head teacher due to repeated absences in government schools. In addition, literature (e.g., Bolitho & Padwad, 2013) suggests that government school teachers are most likely to remain at the receptive end of the Government for CPD. They used to follow the cascade transmission of knowledge from the top authorities (Saigal, 2012). Previous research (e.g., Mooij,

2008) also shows evidence that they usually act as deliverer of curriculum material, and hence, may be less inclined to take initiatives for mentoring themselves. They seem to be in less need to mentor others or get mentored by others.

Therefore, it is understandable that the continuous requirement of securing job and enhancing their CPD actually engaged private school teachers in informal mentoring to a great extent when compared to government school teachers. Hence, a difference has been observed between the two types of schools in this study for this inquiry.

4.2.2 Familiarisation with the Term 'Mentoring'

This issue has been addressed by the research question stated below.

Q. 2. Do Indian teachers familiar with mentoring practice by its terminology?

The findings from the questionnaires found that all the participating teachers (N=171) are familiar with the term 'mentoring' irrespective of their type of school, age-group, work-experience, teaching-qualification and teaching-subject.

However, a completely different dimension has been emerged in the interviews (N=16). Interviews reveal that teachers are less acquainted with the term mentoring. Only 6 private school teachers and the Expert from Delhi University related their actions to the term mentoring and defined it. Other teachers were unable to define or relate their actions with the term 'mentoring' albeit they were agreed to exercise the functions of mentoring in daily routine.

Such outcome is consistent with the findings of the previous mentoring research in a non-Indian context. Mentoring literature highlights that participants either know the term 'mentoring' or not but are unable to relate it to the functions of mentoring sometimes though agree to the execution of its functions in their routine. For example, Goodrich (2007, p.111) found 17 students in the interviews who knew the term 'mentoring' but referred to their 'informal mentoring actions' as "helping each other out" instead of mentoring. Similarly, Dobie, Smith & Robins (2010, p.342) referred to 3 respondents in that study who stated that their role was not to mentor but "yet went on to describe their role with responses consistent with most thematic categories" of a formal mentor. Interestingly, few of the respondents in that research were also not ready to be addressed as mentors.

Something similar has been noticed in this study when an interviewee added that "...We

do not go by these terms. It is just in our system that these things keep going" (A member of management from School-A). Interviewees have also revealed their mind-sets for mentoring which is consistence to its developed concept where mentoring has been derived away from its hierarchical transmission of knowledge (Mentor \longrightarrow Mentee) to a dialogic concept of information flow (Mentor \longleftarrow Mentee). For example, a junior teacher from a private School-A said "...It should be two-way Mentoring, i.e., if a person is mentoring me; he can also be mentored by the same person. There should be equality." Literature (e.g., Chao, 2009) has already showed that in such circumstances people are usually not pronounced as 'mentor' or 'mentee'.

Moreover, it has been observed that mentoring relationships among Indians are likely to be informal in nature (Ramaswami & Dreher, 2010) and such relationships are usually not articulated (Chao, 2009). In such cases, the labels of "mentor or mentee are rarely used to describe current informal relationships, and even when recognized in retrospect, one party or the other may not acknowledge the relationship to be a mentorship" (Chao, 2009, p.315). Such observations are consistent with the present results where participating teachers are involved in mentoring but are less familiar with the term 'mentoring' because of its limited use. Another reason for such results could be the scarcity of mentoring research among Indians (Ramaswami & Dreher, 2010) which might have made it a bit difficult to recognise the term. These could be the reasons because of which Indian school teachers here are found less familiar with the term 'mentoring'.

Overall, informal mentoring is not explicitly recognised among Indian teachers but it is embedded in the context without an assigned terminology. Although School-A has mention of formal mentoring in the policy but as it can be noted from the interview quote above from the same school that the term 'mentoring' is not in used in practice. The private school teachers (as revealed from the policies and interviews) have more opportunities, in comparison to government teachers, to interact with the school systems in Europe and other Western countries where formal mentoring is commonplace. It could be the reason for private school teachers being more familiar with the term 'mentoring' in comparison to the government school teachers in this study.

4.2.3 Informal Mentoring and the Affecting Demographic Factors

This area of interest has been investigated through the following research question:

Q. 3 Do demographic variables affect the extent of informal mentoring received by Indian

teachers?

The questionnaires have not revealed any significant effect of the demographic data of the teachers (such as age, work-experience, teaching-qualifications and teaching-subject) on their involvement in informal mentoring. However, interviews have disclosed a difference in the extent of mentoring received by the teachers with reference to their work-experience and age. The other examined characteristics (i.e., teaching-subject and teaching-qualification) have a limited effect on their engagement in informal mentoring.

Teachers who recently started their career and were young (<35) lacked mentoring opportunities as compared to other categories of teachers. Such results are consistent with the observations made by Ramaswami & Dreher (2010) and George & Mampilly (2012) in their study about mentoring among Indians.

George & Mampilly (2012) when investigated mentoring between teacher-student dyads (N=786) from 19 B-schools in Kerala state of India through a conclusive approach have found age and teaching-experience of teachers countable in formal settings whereas no such relationship was revealed with regard to the designation and qualifications of teachers.

Ramaswami & Dreher (2010) in their research with younger and new Indian professionals have illustrated their preference for the ideal mentor to be four to five years older and senior than them but not more, otherwise it was thought that they would not be able to relate to them. Those Indians also preferred 'two-way mentoring' (i.e., mentor and mentee both can mentor each other). Such an approach, though appreciated and preferred, seems difficult to get supported by older people in India because of the culture of deep-rooted hierarchy which somehow resists reciprocity (Jain & Venkata Ratnam, 1994). A similar expectation of young and new teachers herein could be the reason for securing fewer opportunities for informal mentoring.

Also, the new teachers nowadays have also been reported to have less time and less "inclination to interact with their senior colleagues" (Ganesan & Shalini, 2011, p.54) due to highly packed work time-tables at schools. Hence, they are usually left in isolation without receiving any mentoring. This could also be the possible reason for less involvement of new and young teachers in mentoring in this research.

Old teachers received more mentoring than other groups. Such outcome is consistent with the findings of Finkelstein, Allen & Rhoton (2003) who found older people more engaged in informal mentoring. Lesser involvement of young and new teachers in informal

mentoring can also be understood by the view that people may associate having a mentor with professional incapability to demand help under the guise of mentoring (Murray, 2001; Zellers, Howard & Barcic, 2008).

There is a possibility that the newly joined and young teachers in this study had fewer mentoring opportunities due to the unsupportive attitude of old and senior staff and because of desire to not to be labelled as incapable to perform duties which might have widened the social barrier between the two groups. This may in-turn have hindered informal mentoring opportunities for them.

4.2.4 Level of Satisfaction with Present CPD Practices

This inquiry has been reviewed with the help of the research question given below.

Q.4. Are Indian school teachers satisfied with the present CPD practices or are they seeking a transformation?

Outcome through most of the interviews (N=11) and descriptive statistical analysis of all questionnaires (N=171) shows that teachers are satisfied with the available CPD practices which include supervision through different means (i.e., HODs, facilitators, observers, inspectors etc.), seminars, workshops, dairy-writing, conferences, training sessions etc. and based on the findings to research question.1 in the current project, informal mentoring can also be included in this list.

However, the inferential analysis of quantitative data and some interviews (N=4) have revealed that there is statistical significant difference among all the six participating schools and between the two types of schools for the same enquiry. Such findings show that the individual school environment and the type of governing body have an impact on the perceptions of teachers to existing CPD practices. Results revealed that private school teachers are given more access to present CPD arrangements than the government school teachers. The situation in the government School-E varies greatly from private School-B in this regard.

This outcome is consistence with the previous observations by Singh (2007) who has highlighted that private schools are better than government schools for the development of teachers in India. Similar findings have also been reported by Mooij (2008) when the teachers in that particular study pointed out that career-development in the private schools is better than in the government schools (see section 1.2.3). Such differences could be the

reasons why Muralidharan (2013) has found that parents are less content with the quality of teaching in government schools in comparison to the private schools in India.

However, it is not always the case that private schools are better than the government schools for teachers. For example, Anas & Abdul Azeez (2011) have found government school teachers more advanced than private school teachers with regard to the awareness for 'educational informatics' in the 3 districts of an Indian state, Kerala. This issue was explored during a quantitative approach study of 350 teachers from 25 schools. The PROBE (1999) data also show that government school teachers are not inferior to the private school teachers with regard to teacher competency and teaching skills in the primary sector.

Overall, mixed opinions have been observed in these studies while comparisons have been made about the quality of teaching between government and private schools in India. The private schools (the kind which participated in this study) have been reported to be more active towards promoting CPD of teachers due to high competition among them to attract parents to increase enrolment. This seems to be because the profession has become a form of business for them to earn profits like it is becoming elsewhere in the world today. Hence, being autonomous bodies, the managements invests more towards CPD of teachers and expects more from them in return to ensure a good quality of service delivered in private schools.

This could be the reason why private school teachers are more satisfied with the existing CPD practices as compared to the government school teachers who have limited autonomy and encouragement to promote self CPD (Bolitho & Padwad, 2013). In fact, they depend on the Government to take initiatives for this purpose. Their lack of engagement in making decisions about CPD and, gap between theory and practice of teaching strategies (Muralidharan, 2013) seems to leave them in a state of dissatisfaction.

However, this is not always the case because some less equipped private schools take very little initiative to promote CPD of teachers because of limited resources which could also leave the teachers in a stage of dissatisfaction. This is because such school managements expect the same sort of teaching quality from the teachers as delivered in other high standard private schools but with much less investment.

Overall, a further examination in such situation would help to have a clearer picture regarding this issue.

4.2.5 The Preferences of Teachers

This matter has been explored with the help of the following research question.

Q.5 What are the perceived preferences of Indian school teachers for supervision, formal mentoring and informal mentoring (or the combination of the two) to promote their CPD?

The results here support existing literature which shows more of an inclination that people have towards mentoring, either formal or informal, than to supervision. However, such findings are in contrast to the outcome of the study conducted by Raabe & Beehr (2003) where participants embraced supervisors instead of mentors. But the comparison was made when mentoring was already employed to promote CPD and such a difference between that study and this research could be the reason for obtained dissimilar outcomes. The present results are in-line with the observation made by Arora & Rangnekar (2014) who have emphasised that Indian culture views mentoring (formal and informal) positively. Similar findings have also been highlighted by Chandrasekar (2012) who has reported that formal mentoring has improved the attitude of Indian employees in business administration.

The possible reasons for such findings could be because mentoring has been acknowledged to be more flexible and supportive than supervision and it seems to overcome many of the drawbacks of supervision (e.g., Batteson, 1998). It has also been noticed that teachers are usually fed up with the hierarchical approach of supervision which involves procedures and techniques for controlling their creativity (McGregor, 1960) instead of empowering them to promote CPD and solve real-world queries (e.g., Sharma *et al.*, 2011). Therefore, teachers nowadays usually embrace mentoring as essential to promote their CPD (Sosik, Lee & Bouquillon, 2005; Barrera, Braley & Slate, 2010; Avalos, 2011), and consequently the teachers herein have also found preferring it in comparison to supervision.

The current results also show that teachers prefer formal mentoring to informal mentoring. Such finding is in contrast to the outcome observed by Eby & Allen (2002) where informal mentoring was embraced rather than formal mentoring among 242 accountants. However, they all disclosed the perspectives of mentees only and the viewpoints of the mentor remained neglected. Similarly, Sosik, Lee & Bouquillon (2005) have found 54 teachers preferred informal mentoring to formal mentoring through a survey in K-12 schools in the US. Notwithstanding this, the outcome is consistent with the research

carried out by Boyle & Boice (1998) who have found formal mentoring more plausible than informal mentoring among 25 pairs of volunteer faculty members across various subject teachers in a US university.

The preference to formal mentoring is understandable because the participating teachers are mostly females (N=178/187). It has been noticed that formal mentoring helps staff to avail of mentoring where no opportunities are found otherwise. Such a feature is of great relevance to women in order to overcome the issue of less accessible informal mentoring relationships on their own (Ragins & Cotton, 1999). It has already been observed that women in Indian organisations are less integrated in informal networks due to social barriers and pressures which restrict their career progression (e.g., Ghosh & Haynes, 2008). It seems that such a mind-set has affected the preferences of teachers in this project because they prefer formal mentoring as a way of enhancing their career instead of relying on less available informal relationships.

However, the teachers have wanted to avoid making mentoring too formal which is in-line with the suggestion from previous mentoring literature (e.g., Noe, 1988; Chao, Walz & Gardner, 1992) where inculcating the elements of informal mentoring was suggested in formal mentoring programs. The participating teachers preferred natural initiation of the mentoring process (Scandura & Siegel, 1995; Allen, Lentz & Eby, 2006). For the teachers who opted for informal mentoring, it is not an issue but for others who embraced formal mentoring leniency can be maintained by providing them with the freedom of choosing their partners. Such a tactic has already been recommended in formal mentoring research (Brown, 2001; Gormley, 2008).

The data so far have suggested an overall preference of teachers for mentoring albeit the preferred form of it varies with the 'type of school' they are employed in. The teachers from the government schools (N=41) preferred informal mentoring the most whereas the private school teachers (N=145) embraced formal mentoring. Such outcome can be understood by the observations made in prior research (e.g., Kremer *et al.*, 2005; Muralidharan, 2013) and have already been discussed in section 4.2.1 (supra). Again, more job security for government school teachers as compared to private school teachers seems to be the reason for such differences in the choices of the teachers from two types of schools.

Private school teachers always need to demonstrate skills and work hard to secure job and get appraisals. Hence, they struggle to show progress and get noticed by managements. The performance in formal mentoring is assessed continuously and monitored by the

management (e.g., Hezlett, 2005). Therefore, it could be a good opportunity for the private school teachers to get recognition for being a shining star in front of the management because it offers more opportunities for appraisals than informal mentoring. This happens when a formal mentor takes notice of the qualities of the teacher directly at official standards confined by the management and notifies them for the appraisal purposes. The same purpose seems to be the reason for the choice of formal mentoring among private school teachers.

On the other hand, informal mentoring is more flexible in approach (Sosik, Lee & Bouquillon, 2005) and that seems to be the reason for the preference for it among government school teachers in this research. This is because they may not want to increase unnecessary surveillances when they have secured jobs and the awarding process is equal for both hard-working teachers and those who do not put in any effort (Muralidharan, 2013). Mooij (2008) has already noticed a lack of appreciation for the government school teachers from the superiors and the awards such as 'best teacher' and similar titles have been given to teachers other than those who deserved them. It has been "a well-known fact that the awarding process is partly politicized" (Mooij, 2008, p.515) for Indian government school teachers.

Therefore, an unnecessary load of formal mentoring without appreciation, especially when it includes positive criticism as feedback, may be the reason for the preference of government school teachers towards informal mentoring. Furthermore, the government school teachers used to have an amazing amount of paper work every month for inspection purposes (Majumdar, 2005; Mooij, 2008). In such a scenario, formal mentoring which involves frequent written feedback through form filings may have thought adding to the workload.

Another reason to avoid formal mentoring by government school teachers could be the burden they already have in the form of non-academic tasks such as election duties, census operations, pulse polio campaigns etc. (Mooij, 2008). Formal mentoring literature (see section 2.6.2) illustrates it as a time consuming and burdened practice, therefore, the government school teachers may have avoided more workload by preferring informal mentoring.

On the basis of the above evidence and discussion, the preference of government school teachers to informal mentoring and private school teachers to formal mentoring can be understood.

4.3 Specific Recommendations for the Participated Schools

Prioritising one practice out of three that have been considered here has not been the central concern in this research, especially when it has illustrated sometime that there was no difference between the informally and formally mentored groups (e.g., Zellers, Howard & Barcic, 2008), and when supervision was recorded better than mentoring at some places (e.g., Raabe & Beehr, 2003). This study has been given importance to the main factor (i.e., the willingness and preference of teachers) that has nearly always been found responsible for the success of mentoring, or in fact facilitated the CPD, to make recommendations which are given below:

1. Use the highlighted concept of informal mentoring in praxis: It is suggested to either promote the disclosed concept of informal mentoring among teachers or make use of it to design formal mentoring program for them without following blindly the Western concept for this purpose. It must be pointed out however that the Western model is worth considering given the fact that it has some very good conventional elements of mentoring practice which cannot be ignored.

It has observed that informal mentoring, which has an idiosyncratic nature (Hawkey, 1998), does exist among Indian school teachers. Its identified concept should be facilitated to reap maximum benefits because it has already been recommended from the prior research in Chapter-1 that existing concept dominates over external notion (Elliot, 1995) and formal mentoring programs could not be good substitutes for informal mentoring (Zellers, Howard & Barcic, 2008). Therefore, the importance of the highlighted concept of informal mentoring among Indian teachers in this study should not be ignored to promote their CPD. It has been observed that India has a collectivist culture and Indians have a tendency to prefer interaction (Ramaswami & Dreher, 2010) which will naturally promote it.

The participating schools should familiarise teachers with its highlighted concept with the help of some seminars and workshops to avoid misconceptions and draw benefits. Such actions will encourage teachers to learn more about mentoring and make them aware of its positive and the negative consequences. The stimulated teachers can contribute to reduce the expected negativity if a formal mentoring program would be initiated in the future. However, in case schools want or has been recommended here to encourage formal mentoring straightaway, the recognised concept of informal mentoring should be used for

it as an inception. It will easily help to integrate the practice for them instead of an imposition of an entirely Western notion. Such considerations are necessary when the differences have been observed in the outcome for formal mentoring between Western and Asian contexts due to cultural divisions (e.g., Lee & Feng, 2007; Liu *et al.*, 2009).

- 2. Policy Reformation-Mentoring or Coaching: Policies from School-A show that new teachers with experience of 0-3 years "are coached or mentored either by the class coordinator or senior faculty member" (see appendix-13). This statement is mystifying because it is not clear whether the coaching and mentoring have been taken to be one practice or it has been mentioned according to the needs of the teacher. Based on the discussion in section 1.1.4 earlier and knowledge from appendix-1 it is suggested that clear information should be included in the policy referring to formal mentoring including its concept, structure and how it has been deemed different from coaching in practice in school.
- **3. Familiarise teachers with the term 'Mentoring'**: Data in Section-3.3 show that teachers are less familiar with the term 'mentoring' and find it difficult to relate their mentoring actions to its terminology. Therefore, depending upon the information in Section-1.3.1 it is emphasised that teachers should be made aware not only with the term 'mentoring' but also to its concept so that they may relate their actions to the practice.
- **4.** Need of mentoring for new and young teachers: It has been observed from the results in Section-3.4 that new and young teachers have got less informal mentoring opportunities here. Therefore, it is recommended that schools should either encourage informal mentoring to provide support indirectly or consider introducing an induction program through formal mentoring for them.
- **5.** Understand the need of transformation in CPD practices: Data in Section-3.5 show a statistically significant difference in the level of satisfaction with present CPD practices among all six schools and between the two types of schools. The reasons behind the obtained patterns between the two types of schools are easy to understand. However, there is no clear explanation suggested for the variance found among the schools within the same organisational sector given the fact that private school authorities are vigilant at their best and the Government authority is the same for all three schools. Therefore, there is a

need to examine the context of each school in-depth to understand the observed pattern or to conclude it as a 'sample-effect'.

- **6. Promote mentoring and scrutinise supervision**: Overall results in Section-3.6 show that mentoring is preferred to supervision. Therefore, it is recommended to the participating schools to comprehend (a) How mentoring practice could be incorporated in the school culture to reap benefits? and (b) Where are the present arrangements to supervision lagging behind in fulfilling the needs of teachers? and How can it be amended?
- 7. Informal Mentoring for the Government Schools: The government schools are advised to encourage informal mentoring instead of adopting a 'formal mentoring program' because teachers have preferred it (see Section-3.6). This recommendation is consistent with the prior suggestions that informal mentoring should be promoted if formal mentoring cannot be carried out in the context (Arifeen, 2010). This is so because it is the organisation that gets the best from successful mentoring which in turn depends on the willingness of the participants.

The literature review in Chapter-1 indicates that the adoption of formal mentoring in the government schools with unwilling teachers may cause trouble in future. They may associate having a formal mentor with professional incapability because it somehow implies that one needs help (Beans, 1999; Zellers, Howard & Barcic, 2008). 'Tor-mentors' can also be expected among them (Alpert, Gardner & Tiukinhoy, 2003).

In addition, it is also recommended to train teachers (not as in formal mentoring) who would be recognised as informal mentors because they might have remained in the role of supervisor before and need some help to gain insight into the process of mentoring. This recommendation is in-line with the suggestion of Godshalk & Sosik (2000) who encouraged developmental training for informal mentors so that they can handle and understand the relationships.

Nevertheless, if government schools still want to promote a formal mentoring program, they should first encourage the teachers to accept it. The results herein have shown their level of readiness for it. To boost their preparedness, they should be detailed with the mentoring process. However, the associated concerns should be examined in further research to come up with a useful plan.

8. Formal Mentoring for the Private Schools: It is suggested for the private schools to

implement formal mentoring because the participating teachers have preferred it (see Section-3.6). Such recommendations are consistent with prior suggestions by Ragins (2002) in Chapter-1 herein who has agreed that although informal mentoring is more effective than formal mentoring, this is not always the case. The benefits derived from mentoring have depended upon its quality rather than its formality (Ragins, Cotton & Miller, 2000; Wang, Tomlinson & Noe., 2010). However, there have been negative experiences associated with formal mentoring which cannot be ignored (Eby & Allen, 2002). Therefore, there are risks to be aware of.

The private schools need an appropriate strategy to inculcate formal mentoring in their context successfully. Kunich & Lester (1999, p.27) have suggested that for formal mentoring it is worth spending the time "to organize a coherent, individually tailored plan. Failure to organize will result in aimless drift largely random activity-with no guiding principle to steer the ship toward any particular port". Therefore, the importance of the matching process of mentor and mentee, real commitments, continue program assessment, the suggested 'way out' for the dysfunctional relationships, ethical awareness about mentoring and other contextual factors should be taken care of, especially, in School-A that has mentioned it in the school policies without considering such measures.

Furthermore, consistent with the suggestions from Scandura (1998), Bramley *et al.* (2012) and Arora & Rangnekar (2014, p.215) it is recommended that teachers (who might have remained in supervisory role) should be trained in advance to make them better able to understand how to deal with different personality traits and "to be trusting, friendly, polite and patient, available when needed, ready to give sincere advice, and [being] nonjudgmental" to avoid dysfunctional mentoring relationships.

4.4 Potential Implementations for the Indian Context

The outcomes outlined are expected to be implemented by those related to the field of education or other professions in India or elsewhere (Figure 4.1). Furthermore, it has been acknowledged in social research that "It is the reader, not the researcher, who determines what can apply to his or her context" (Merriam, 2009, p.51) from a study which has broadened the scope of this project.

• For Indian Schools

1. It is clear from the literature review at the start of Chapter-1 herein that there is

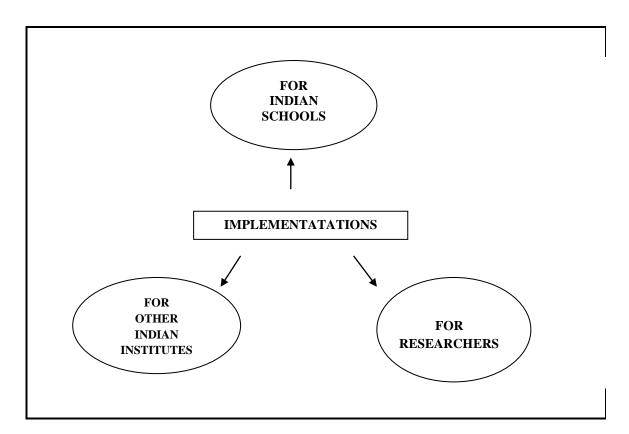


Figure 4.1 Scopes of Implementations of the Research

scarcity of literature on mentoring in India, especially with teachers. Based on this observation, the results from this study could be used to develop a correlation between the 'mentoring' practice and the 'Indian context'. A plan to promote mentoring could be developed accordingly after considering the possible constraints (of time and effort). It is suggested to enhance the experience for mentoring with the help of teachers primarily due to its highly contextual nature (Kent, Kochan & Green, 2013).

2. Based on literature review in sections 1.1.2 and 1.3.3 it is suggested that the revealed concept of informal mentoring should be used to promote both formal and informal mentoring. Wildman *et al.* (1992, p.212) strongly suggest that "mentoring involves highly personal interactions, conducted under different circumstances in different schools, [therefore] the roles of mentoring cannot be rigidly specified". Therefore, it would not be ethical to impose a rigid definition or concept of either informal or formal mentoring among Indian teachers under political pressure through centralised policies while there is a great possibility for existing concept to dominate over the externally mandated notion (Elliott, 1995).

3. Teachers preferred mentoring over supervision; therefore, depending upon the judgements derived in the literature review in sections 1.1.8, 1.3.1 and 1.3.3 Indian schools are asked to scrutinise such inclination if they have been strongly felt. It has been advised because mentoring, either formal or informal, usually has been seen to become a relationship of nurturance and paternalistic care. There are possibilities for this to happen in India because the mentors may take it on as a benevolent parental role (Ramaswami & Dreher, 2010). Such perceptions, firstly, may cause the mentors to "feel obligated to protect junior employees and be involved in their work and nonwork lives" (Sinha, 1980 quoted in Ramaswami & Dreher, 2010, p.522). Such overinvolvement could cause problems (Pellegrini & Scandura, 2008). Secondly, it could hinder the creativity and can lead to cloning (Johnson, 2007). This phenomenon is more suitable for an organisation where replication is required (Sundli, 2007) but not for teachers.

Moreover, the low preference for supervision may be observed to reduce the present burden on self. At present, teachers take their own initiative to develop creativity but with mentoring they may started following their mentor in every respect which in turn would hinder their own independent efforts to CPD. Hence, it is encouraged that the reasons behind the least preference to supervision should be understood and dealt with appropriately if found to a large extent.

4. Based on literature review in sections 1.1.4 and 1.1.5 it is advised to be alert while inculcating mentoring as a practice in Indian schools which have been dominated with supervision till recently because the process should be deeply felt instead of being superficial. Sundli (2007, p.207) highlighted the observations made by Edwards (1997) with British teachers when the mentoring "notion has been taken up and has superseded and replaced an earlier term, namely supervision" yet the modus operandi resembled supervision.

In such circumstances mentors usually fail to support the mentee (e.g., Hardy, 1999; Smith & Maclay, 2007) and even may result in a situation observed by Beck & Kosnick (2000, p.207) with the 'associate teachers' of 'pre-service education programmes' in Canada. Those mentors "often seemed to be rather 'tough' on the student teachers giving them a very heavy workload and generating in them a considerable amount of anxiety". Similar circumstances also have resulted in bullying of mentees (43%) by mentors in 'Improving Teacher Programme' in England

(Maguire, 2001). Such mentors are recognised as 'tor-mentors' who exploit the careers of others under the guise of mentoring. Such possibilities may be expected in India if mere replacement of the term from 'supervisor' to 'mentor' would be done instead of its integration in the system.

Samanvaya (2008) has already noticed the situation in the government schools where the inspectors abused teachers regularly. The positive criticism in mentoring could add to such instances if careful measures are not taken. It would be so because it is likely that in the name of providing 'positive critical feedback', the supervisors or inspectors would get a licence to abuse the teachers, especially, to those who are bound to their duties due to financial reasons. However, it was not and may not always be the case, but necessary precautions are required.

Ramaswami & Dreher (2010, p.516) have already found that 70% of the respondents in that research among Indians identified their supervisors as their mentors, and hence the "judgment bias emerged as one of the main pitfalls for the protégé". One respondent in that project added that "In Indian terms, mentorship is just performance evaluation. In companies, I haven't had any personal mentorship, and I guess 80% of the [working] population is of the same type" (p.517).

Therefore, the mere replacement of the term from 'supervision' to 'mentoring' in the policies and in practice may result in a worse situation among teachers.

- 5. It is suggested that a tactful strategy should be adopted to move on with mentoring because in the hierarchical dominating context of India, it may be seen as a weakness to need a mentor. For example, a senior teacher from participating School-B said that she did not want mentoring to spoon-feed junior teachers (see page-112 earlier). Similar concern was also raised in the reviewed literature by Beans (1999), Murray (2001) and Zellers, Howard & Barcic (2008). The higher authorities in India who believe that for learning to happen one should muddle on in his/her own may comment something like: "I learned how to be a principal on my own, so why do the new people need mentors?" (Daresh, 2004, p.511). However, there are fewer expectations for such thoughts to seep in when the teachers showed a positive attitude towards mentoring at the initial stage but precautions are necessary.
- 6. Based on the fact which is confirmed by Mooij (2008) and two interviewees (a teacher from School-E and the Expert) in this study with regards to 'non-academic

duties (such as election, polio etc.) for teachers it is recommended that some incentives should be given to those teachers who will mentor. It is so because the issue has been raised to empower or enslave teachers with the use of mentoring (e.g., Batteson, 1998). It should be addressed that Indian teachers have "heavily content loaded subjects, large class sizes, pressures of preparing students for exams, scarce resources and low pay" (Nargund-Joshi, Rogers & Akerson, 2011, p.644). Therefore, they should not be expected to take the burden of mentoring as a whole. A release in workload from the non-academic aspect should also be considered.

On the whole, this research shows within its limits that there is a need to rethink, examine and explore the context of Indian schools before promoting mentoring (either informal or formal) as a main approach to CPD of teachers. However, Muralidharan (2013) has evidenced that attentive empirical outcomes have been neglected by Indian establishments. Most of the prior research stress on the history and philosophy of education rather than drawing empirical research based conclusions for the teachers. Given the fact that mentoring could have a major impact on teachers, the empirical evidence (such as from present research) should not be neglected and the suggestions should be considered.

• For other Indian Organisations

Apart from the educational field, the findings herein may be of use to other Indian professionals who have been thought of adopting formal mentoring as a main tool to CPD. The MNCs in India which may have or are planning to have a formal mentoring program (e.g., Dayasindhu, 2002) are advised to re-examine their context under the influence of the outcomes from this research. This is recommended because Sosik, Lee & Bouquillon (2005, p.97) have highlighted that one major reason behind formal mentoring being less "effective than informal mentoring may be that the formal programs were not a "good fit" with the organisational context in which they were embedded."

It has been advocated that the development of formal mentoring needs careful planning and consideration (Hopkins-Thompson, 2000) otherwise negative consequences might take place (refer back to section 1.1.8 herein). Such outcomes could probably have been obtained in situations similar to the participating government schools where teachers preferred informal mentoring and stressed to think carefully about the implementation of a formal mentoring program. Unwillingness may suppress the professional attitude and CPD

of the employees. Therefore, similar to this research, the exploration of the preferences of the employees would be a useful task so as to know their readiness towards formal mentoring.

However, it could be that the employees may embrace formal mentoring similar to the private school teachers in this study. Nevertheless, it is necessary to explore the willingness of the participants and findings to this research may be of use in such research among Indians.

• For Researchers

In the situation of scarcity of mentoring literature among Indians, the outcomes from the present *in situ* empirical investigation among Indians would be advantageous for the researchers who want to examine mentoring in India or Indians situated elsewhere.

4.5 Contributions to the Literature

This study has contributed to the literature as follows:

- 1. To 'Indian Mentoring Literature': The results have revealed the existence of informal mentoring and helped to understand its concept among Indian school teachers. This research is probably the first systematic study to collect empirical evidence among school teachers in India in relation to informal mentoring. It has provided rudimentary empirical evidence because it has been suggested that to promote CPD, one "should use empirical knowledge to drive systematic study that can build on previous work" (Desimone, 2009, p.187).
- **For policy formation**: This research has highlighted the dissimilarities between the policies (where the concept of mentoring is nearly always missing) and in practice. The involvement of teachers in the process of policy formation in India is almost neglected whereas the CPD of teachers is usually embedded in their context, attitudes and preferences which should be valued for the practical application of policies. Dyer *et al.* (2004, p.41) have already stressed that "unless these complex relationships

Dyer et al. (2004, p.41) have already stressed that "unless these complex relationships between teachers' beliefs and local contexts are recognised, explored, and their implications taken on board, teacher development through in-service training is highly unlikely to fulfil the explicit premise (and promise) of decentralisation—responsiveness to those local contexts". They have added that teachers used to have

clear views about what is possible in the school. Teachers know their capacity well and can overcome the barriers by building confidence when their expressed views are taken into account (Pryor, 1998).

This research has responded to this call in relation to mentoring by providing a platform for the teachers to share their preference. Considering the importance of the number of teachers who would get affected by new policies on mentoring, stakeholders in India should take account of their knowledge and preference (Zeichner, 1995; Rajuan, Beijaard & Verloop, 2007). This study has been given priority to support the mentoring based on practical knowledge and the willingness of teachers. It is hoped that suitable policies will be derived accordingly.

• For researchers: The investigators who have been interested in the CPD of teachers in India through 'mentoring' (e.g., UKIERI, 2008-till date) or among other Indian professionals with an external perspective may derive advantage from the current outcomes. It can be a useful source of literature on mentoring among Indians in India to understand and draw some conclusions for mentoring.

Whilst the participants in this study are Indian teachers but the observations can be used for other Indian professionals because CPD through mentoring is not confined to the teaching profession only. Other professionals have also been experiencing 'informal mentoring' (e.g., Arora & Rangnekar, 2015) which should be explored and examined to understand the underlying concept and can be compared to the revealed concept in this study. Also, the results could be useful to research among employees in the MNCs who wanted formal mentoring (e.g., Chandrasekar, 2012) or deal in the Western context frequently where formal mentoring is a common mode of CPD.

- 2. To 'Mentoring Literature in Asia': It has been observed that non-Western contexts for mentoring research have been ignored (e.g., Liu *et al.*, 2009). In non-Western mentoring research generalisations are usually derived from the findings from Western literature (e.g., Bozionelos & Wang, 2006; Clutterbuck, 2007). This research has added to mentoring literature from Asian countries.
- 3. To 'International Mentoring Literature': Most of the prior formal mentoring research has been explored the preferences of the participants after the program has already been established and (not always but at most of the incidences) the negativity

in the organisational environment has already started to creep in. The attempt in this study is to explore the preferences of teachers prior to the official implementation of the formal mentoring program. Such an approach has not been observed elsewhere in accessed literature. This strategy makes this project worthwhile because something similar can now be adopted by others who look forward to adopting formal mentoring programs. This is because 'a precaution is always better than a cure'.

This approach assessed the level of readiness of teachers for formal mentoring at the planning stage and saved resources, time and manpower to implement it in situations where it has not been preferred, and then explored the possible reasons behind lack of its success. Such a preliminary exploration of the preference to formal mentoring is useful because it will more likely to fail if the participants are not ready for it from the beginning.

4. To 'Literature on CPD Practices and Supervision': Previous research has compared supervision with mentoring (e.g., Raabe & Beehr, 2003) and formal mentoring with informal mentoring (Chao, Walz & Gardner, 1992; Eby & Allen, 2002; Sosik, Lee & Bouquillon, 2005). This research is probably an initiative to compare the features of the aforesaid three practices simultaneously. The developed continuum herein to compare the features of these three practices (see Table 2.2) is unique to it and its validity can be cross-examined in further research.

4.6 Limitations

Similar to other research this project has some limitations:

- (i) This study was designed as a snapshot due to time and financial constraints of a doctoral course frame which eliminated the possibility of adopting other approaches to collect longitudinal data or use alternate methods.
- (ii) The types of participating schools may have affected the results because in India there are several types of schools "such as government, private aided, private unaided, central public, etc" (Joolideh & Yeshodhara, 2009, p.130) which have usually been categorised in two broad squares, i.e., government and private. The government schools involved here were MCD schools; therefore drawing generalisations would not be straightforward for other types of government schools in Delhi or India such as 'Senior Secondary schools',

'Kendriya Vidyalya', 'Navodya Vidyalya', 'Rajkiya Pratibha Vikas Vidyalaya' etc. The organisational differences may affect the outcomes to be generalised to other type of government schools. However, the differences are not vast and similar results could be expected in a larger project in future. The participating private schools have well established managements and extended links (nationally and internationally) for the development of teachers. Consequently, the generalisations may be derived for other private schools with similar circumstances but there is a possibility to observe a difference for those which are comparatively less equipped.

- (iii) Considering the prima facie nature of this project, it is not simple to strengthen the grounds for drawing generalisations without further research. However, an attempt has been made to minimise the impact of diversity by including multifarious schools. All the six participating schools not only varied in their organisational sector, i.e., government or private, but were also dissimilar from each other with regard to management, facilities, autonomy to teachers, finances, number of staff etc. Therefore, they offered robust information with multiple perceptions. In fact, similar results may be expected for other teachers from North-India states at least because they have expected to have similar aspects of their local knowledge (e.g., PROBE, 1999).
- (iv) None of the available mentoring research among Indians, either with school teachers or at other workplaces, brought up the issues raised in this research. Therefore, the direct comparison for the outcome with other studies and discussion are not possible at this point of time, and the wide range of literature from the West and other Asian countries has guided the process. This impact was minimised by including Indian mentoring related correlations wherever possible.
- (v) There is a possibility that difference in the extent of informal mentoring and in the preferences of teachers to the CPD practices between government and private schools might have been observed due to the difference in the number of staff in the schools, their working style and level of individual comprehension to questions. All the participating government schools are primary with fewer staff where teachers are like mother-teachers who needed to be in the same classroom for the whole day. Comparatively, the private schools are secondary schools with more staff (including a mixture of primary and secondary teachers) where secondary teachers certainly used to change classrooms

frequently after each period and primary teachers do so occasionally. Hence, there is a possibility that private school teachers may have more interaction opportunities in hallways whereas government school teachers were usually bound to nearby available opportunities to their classroom. Such arrangements may have affected available time, resources and experiences which in turn may have probably impacted their experience to mentoring and preference to CPD practice in questionnaire.

- (vi) The overall preference to formal mentoring may be the artefact of difference in number between the participating private school teachers (N=145), who preferred formal mentoring, and the government school teachers (N=41), who preferred informal mentoring. However, this impact was attempted to be minimised by comparing the Means of samples through statistical tests in SPSS which used to compare the unequal samples with least impact on the results.
- (vii) The 'gender' variable which has remained a factor to correlate with mentoring in previous research in India (e.g., Ramaswami & Dreher, 2010; Arora & Rangnekar, 2015) or elsewhere has not examined in this project. This is because the participating teachers were mostly females (N=178/187). Therefore, there is a probability for the results to be affected with 'gender-drift'. Consequently, more studies with male teachers have been suggested.
- (viii) Due to the linguistic context of the study, it was necessary to translate collected bilingual data (i.e., Hindi and English) into the English language. This may have led to some unintended language issues. However, these issues were minimised by the help of a professional translator and by being very careful while data were being translated. It was also of great help that the researcher herself is also completely bilingual in both Hindi and English.
- (ix) Although both the English and the Hindi versions of the questionnaires were checked by a professional translator, some of the statements on the English version were ungrammatical (but the meaning still accessible to bilingual speakers of Hindi-English) and the wording of the Likert scale options did not flow perfectly from the statement as a result. This may have affected responses of teachers to the question, although it was assumed that teachers understood that the numerical options reflected a continuum between an affirmative and a non-affirmative response to the statement.

- (x) One could argue that the wording of the statements make it difficult for the reader to demonstrate clearly to the researcher whether they are responding based on their actual experiences or whether their responses truly reflect their actual preferences in relation to mentoring/CPD. However, teachers were told explicitly (as can be seen on the questionnaire form) that the researcher was interested in their preferences, but care must be taken in interpreting the responses nevertheless.
- (xi) Seniority of the teachers was not identified within the sample who returned the questionnaires. Although the interview sample was selected carefully in order to ensure that they views of staff from various stages of seniority was heard, it was not possible to identify where there were any variations within the responses to the questionnaire among the wider population according to their seniority within their schools. Future studies should ensure that it is possible to identify clearly the views of those who have senior positions and those who have more junior positions within schools in order to identify issues that are of particular relevance to particular staff.
- (xii) Lastly, there are possibilities that the perceptions of the researcher might have influenced the results due to the vague nature of mentoring and the coinciding features of supervision, formal mentoring and informal mentoring where sometimes it was not easy to draw clear distinction lines between them which may have affected the allocated place to them on the continuum. Few included references had not clearly stated whether the considered mentoring was formal or informal in nature and it was left to the reader to perceive it through indirect hints. However, the literature guided the whole project to minimise such impact and the use of 'continuum' and Likert scale which provided ordinal data supported the nature of queries which were under investigation to curtail the aforesaid concern to distinguish practices from each other and observe their nature.

4.7 Conclusions

It can be concluded that the notion of informal mentoring is existing among Indian school teachers in the form of providing professional help, assistance, advice, shared feedback, reflection, long-term support, agreed and frequent observations, reciprocity in roles, acceptance to positive criticism, free expression, and personal care and encouragement. The extent of it varied between government and private schools. However, more exploration is required around this issue with other sorts of schools from each category.

The practice has not been addressed as 'mentoring' in the context; therefore, teachers herein were found to be less familiar with the term 'mentoring'.

However, it does not mean that all the school teachers in India are involved in 'informal mentoring' apparently or in disguise. Nevertheless, it seems that informal mentoring exists among Indian school teachers but unfamiliarity with its concept has been kept it delitescent. The 'actions of teachers' those are similar to the 'functions of mentoring' have not been officially declared as mentoring which might have kept the teachers less acquainted with the term 'mentoring'.

Demographic factors have been found to have negligible effect on the extent of informal mentoring received by the teachers. However, new and young teachers are at loss in this regard. Further investigation has been requisite to get explicit opinion, especially, in relation to variance along 'gender difference' because this factor has not considered here due to a female dominated sample.

Nearly all the participating teachers have shown satisfaction with current CPD practices but the satisfaction level varied with individual school environment and with the type of school, i.e., government or private. A thorough examination has been counselled to study this issue.

Teachers preferred mentoring to supervision; however, the approach to it varied between the two types of schools. The private school teachers opted for formal mentoring and the government school teachers embraced informal mentoring. However, the observed choices lacked steadfastness at a few junctures and were seeking a blend of both. This is due to the fact that the government school teachers have demanded recognition to the attempts they make which is mostly possible through formal mentoring albeit they have chosen 'informal mentoring'. Similarly, the private school teachers have insisted on a 'free-exchange' of information between them which is extremely likely in the flexible structure of informal mentoring though they have opted for formal mentoring. Nevertheless, the observed preferences count on the capacity of the Indian system to accommodate 'formal mentoring' among school teachers by demonstrating the level of their readiness for it.

4.8 Suggestions for Future Research

This project has been considered as prima facie for mentoring among Indian teachers. Therefore, further research is warranted because it has been noticed that the examination of context is rarely done prior to adopting formal mentoring (e.g., Kram, 1985; Colley,

Hodkinson & Malcolm, 2003). Hence many of the problems (or failures) related to mentoring have been observed due to the lack of its compatibility with the appropriate context (Sosik, Lee & Bouquillon, 2005). Further investigation can only provide the guidelines to introduce mentoring in policies, curriculum, CPD plans, and practice for inservice teachers in India. The following areas of examination have been advised:

- 1. To "understand mentoring, one must view these relationships within the organizational or cultural contexts in which they occur" (Clutterbuck & Lane, 2004 quoted in Zellers, Howard & Barcic, 2008, p.557). Therefore, to define mentoring among Indian teachers/Indians there is a need to deem its informal concept among them. This study initiated such effort but further examination is required to grasp the notion completely.
- 2. There is a need to understand how mentoring can be promoted in India. It has been understood that individuals from India and the West had similar shared values and norms at a point of time (Au, 1999) albeit there are reasons to examine mentoring in India because Indian and the Western culture differ in terms of hierarchy (House *et al.*, 2004; Pio, 2007). Moreover, in order to give importance to the fact that empirical evidences on mentoring in India are scarce (Ramaswami & Dreher, 2010; Pryce *et al.*, 2011) further empirical research has been suggested.
- 3. Further investigation among teachers and the stakeholders at a larger level is required to comprehend what they expect for mentoring and from mentoring.
- 4. This project should be replicated or a different approach (e.g., ethnographic, observations, longitudinal surveys, case-studies and experimental etc.) can be applied to get results either in favour or contradictory to the present findings to draw robust generalisations. Another technique such as the 'use of different functions of mentoring than here' or 'providing a definition of mentoring' can also be employed.
- 5. The affect of demographic factors to the extent of informal mentoring received should be examined in relation to the 'gender' difference.
- 6. The level of satisfaction with present CPD practices varied in different schools from

same organisational sector and with the 'type of school'. Hence, further investigation is suggested to understand the whole scenario.

7. Finally, it is common to find that schools everywhere have been buying formal mentoring programs for teachers without paying due attention to them beforehand (Casavant & Cherkowski, 2001). Previous to further effort, there is a requirement to scrutinise it at a larger level which leads to the question 'Is mentoring needed as an official practice among Indian teachers at all?' This is because the existing research in similar Asian context, i.e., Pakistan, illustrates that people "do not perceive mentoring as important to their advancement" (Arifeen, 2010, p.226). Arifeen (2010) has found that unwillingness for mentoring was due to competition among the participants and they did not want to share their best with others while mentoring. Hence, those seniors deliberately avoided mentoring. Therefore, future research should examine the preferences of teachers to mentoring at a larger level.

To sum up: The effectiveness of the 'formal mentoring program' depends upon the needs of the teachers and schools (Foote *et al.*, 2011) and whether it is a "good fit" in the context or not (Sosik, Lee & Bouquillon, 2005, p.97). Therefore, it is worthwhile to take into account the existing literature on mentoring before recommending formal mentoring among Indian school teachers. Vigilance at earlier stages of planning is necessary otherwise it would help to develop some careers and would impede others. The elements which could facilitate or hinder the process should be considered. It is also important to involve more stakeholders because their consultation is needed in order to come up with a meaningful in-service program for teachers (Rajan, 2012). Further research can only help to take the necessary measures.

Finally, it is hoped that this research can help society at large not only in India but in other countries to facilitate mentoring among professionals.

Appendix-1: Coaching and Mentoring

USEFUL LINKS:

- http://hrd.sagepub.com/content/2/4/360.full.pdf+html?hwshib2=authn%3A1462014666%3 A20160429%253A2db73aa3-f65f-4dca-9487c844e1a01208%3A0%3A0%3A0%3AJhAIjk4auhhA0cc7%2BH9ELw%3D%3D
- 2. http://www.emeraldinsight.com/doi/pdfplus/10.1108/14777280810886364
- 3. <a href="https://books.google.co.uk/books?hl=en&lr=&id=XPWGAwAAQBAJ&oi=fnd&pg=PP1&dq=dif-ference+in+coaching+and+mentoring&ots=NyQ2Z0awMA&sig=l6jByFtYPcWOSl6-RLxeYi17rSo#v=onepage&q=difference%20in%20coaching%20and%20mentoring&f=false
- 4. http://www.management-mentors.com/resources/coaching-mentoring-differences
- 5. http://www.coachingandmentoring.com/Articles/mentoring.html
- 6. http://www.brefigroup.co.uk/coaching/coaching and mentoring.html
- 7. http://www.ucl.ac.uk/hr/od/coaching/differences.php
- 8. http://www.ncl.ac.uk/cflat/news/documents/5414 CfT FINALWeb.pdf
- 9. https://www.apm.org.uk/blog/difference-between-coaching-and-mentoring
- 10. https://www.coaching.com/public/Find Answers/Coaching vs Mentoring/

Appendix-2: Questionnaire



BANGOR UNIVERSITY, UK <u>Questionnaire for teachers</u>

<u>Section-1</u> Personal Information: (Tick ($\sqrt{}$) the appropriate option for Q.1and Q.2)

1.	Gender: M F
2.	Age group: 25 or below 26-30 31-35 36-40 41-45 46 or above
3.	Your experience (how many years) as a teacher.
4.	Your experience (how many years) as a teacher in this school:
5.	Qualification degree/s achieved:
6.	Teaching Subject/s:

(Note: The term 'colleague' in the statements of the following sections refers to a person who may be designated by your school as supervisor or supervisee, mentor or mentee or s/he may be your co-worker, senior or junior teacher, head of the department (HOD) or principal.)

Section-2 Please read the statements provided in the left-hand column carefully and tick ($\sqrt{}$) the number in right-hand column that best reflects your view. 1= Never to 5= Always

S.no.	Statement	1	2	3	4	5
1.	I have a colleague who helps me in the planning of my work.					
2.	I often help my colleague to plan his/her work.					
3.	I have a colleague who assists me in learning the technical aspects of teaching job.					
4.	I assist my colleague in learning the technical aspects of teaching job.					
5.	I have a colleague who advices me about new learning opportunities.					
6.	I advice my colleague about new learning opportunities.					
7.	I have a colleague who gives me feedback regarding my work.					
8.	I give feedback to my colleague regarding his/her work.					
9.	My colleague helps me to reflect on my teaching practice.					
10.	I am involved in a long-term professional relationship with my colleague.					
11.	I have a colleague who genuinely cares for me as a person.					
12.	I genuinely care for my colleague as a person.					
13.	I have a colleague who provides support and encouragement to me in stressful times.					
14.	I feel happy and satisfied about my professional development with the use of current practices in the school.					
15.	I understand the concept of mentoring.					

APPENDICES

Section-3

This section relates to your preferences for the features of professional development practices in your current school. You can tick ($\sqrt{}$) any box out of 1 to 6, based on your preferences for your professional development.1=Least preferred to 6= Most preferred.

-			1 2				
S.no.	Features of professional development activities	1	2	3	4	5	6
1.	Written feedback of your overall performance by a colleague.						
2.	Brief and direct evaluation of your teaching practice by a colleague.						
3.	Frequent and continuous evaluation of your progress.						
4.	Spend more time on your professional development.						
5.	Increase in workload by involving in professional development practices.						
6.	Class observation by your colleague (to learn from him or to help him learn).						
7.	Intervention in your independent working/teaching style by your colleague.						
8.	Make positive use of criticism of your current teaching practice by a colleague.						
9.	Continuous involvement in professional development practices.						
10.	Take responsibility for the professional development of your colleague.						
11.	Commitment towards the professional development of your colleague.						
12.	Trust on your colleague to discuss your professional or personal problems.						
13.	Readily ask for help without the fear of being criticised for your lack of knowledge.						
14.	Ask somebody to personally assist you in your professional development.						
15.	Share your teaching experience and knowledge with another colleague.						
16.	You can learn from your junior colleagues.						
17.	Give equal importance to both, senior or junior, teachers for your professional development.						
18.	Involvement in a long term relationship with your colleague for your professional and personal development.						
19.	Give priority to your organisation to choose an observer for you (instead of one chosen by you) who can help in your professional development.						
20.	A hierarchical structure in which seniors simply tell juniors what to do.						

Many thanks for your time and effort.

Appendix-3: Relevant Focus and Interview Questions to Teachers

The Focus of the Interview Questions

Interview	Relevant focus		
question			
Q.1	Present CPD practices in other schools in Delhi.		
Q.2	Most widely used CPD practice in Delhi schools and the satisfaction level with it.		
Q.3	CPD policies in the present school and the level of satisfaction with them.		
Q.4	Professional practices in the present school.		
Q.5	Familiarity with the term and concept of mentoring.		
Q.6	Preference between mentoring and supervision (through preferences to features such as evaluation, assistance, time and efforts requirements).		
Q.7	Preference between formal and informal mentoring (through preferences to the features such as naturally developed or assigned practice and evaluation free assistance or evaluated assistance).		
Q.8	Overall preference to a CPD practice in the present school.		



BANGOR UNIVERSITY, UK

Personal Information:

7.	Gender: M F			
8.	Age group: 25 or below 26-30 31-35 36-40 41-45 46 or above			
9.	Your experience (how many years) as a teacher/Principal.			
10.	Your experience (how many years) as a teacher/Principal in this school:			
11.	Qualification degree/s achieved:			
12.	Teaching Subject:			

INTERVIEW OUESTION

As I said before when you signed the consent form, I wish to talk to you about Continuous Professional Development (CPD) of teachers practised in your school and other Delhi schools. My first question is:

- Q.1How much do you know about CPD of teachers in Delhi schools?
- Q.2There are different forms of CPD. Do you know them? Which forms of CPD are you familiar with?
 - a) Which form do you think is most widely practiced in Delhi schools and rest of Indian schools?
 - b) Is the use of this form satisfactory? Why or why not?
- Q.3 Does your school adopt any policies/practices/measures for CPD of teachers? If yes, what are they?
 - a) Are you satisfied with these policies/practices/measures or with current state in the school for your own development? Why or why not?
- Q.4Do teachers in your school help each other with their professional development? If yes, in what manner?
- Q.5Do you know mentoring as a form of CPD? If yes, what are its features? Is it better than others? If yes, in what manner?
- Q.6 Out of various forms of CPD,

APPENDICES

- a) Some emphasise more on evaluation of the teacher's development or performance whereas others put more emphasis on providing assistant to him/her than evaluation. Which forms do you think should be practiced in your school? Why?
- b) Some such as mentoring may need more time and effort, more frequent contact between teachers and provide personal support along with professional support but they are often said to be useful. However, these activities may increase workload. What do you think your school should do to face this dilemma?

Q.7Further, CPD practices can

- a) Be designed by the schools or can naturally develop among the teachers. Which do you think your school should prefer to do? Why?
- b) Include assistance for the teacher's development or this assistance, sometimes, is followed by evaluation of his/her progress. Which do you think should be practiced in your school? Why?
- Q.8Which features of CPD, overall, do you think should be practiced in your schools? Why do you think they are more suitable to your school?

Many thanks for your time. Do you have anything to add? Or any questions to ask?

Appendix-4: Interview Questions to Expert



BANGOR UNIVERSITY, UK

INTERVIEW QUESTION

As I said before when you signed the consent form, I wish to talk to you about Continuous Professional Development (CPD) of teachers practised in Delhi schools. My first question is:

- Q.1What are the current policies/practices/ measures, if any, for CPD of teachers in Delhi schools?

 a) Are you satisfied with these policies/practices/ measures? Can you explain the reason for your answer?
- Q.2 As you may agree, there are different forms of CPD practices. What is the most frequently practised form of CPD in Delhi schools? Is it fulfilling its aims and objectives? Why or why not?
- Q.3 Delhi university has used 'Mentoring' as a tool for CPD of teachers in the MINDS (2010) pilot phase study. The report states that the notion of 'Mentoring' is absent from most of Delhi schools.
 - a) Do you agree with this? Why or why not?
 - b) How would you define 'Mentoring'? What activities does it involve?
 - c) Have you found it better than other forms of CPD in the pilot phase of MINDS, 2010? Can you explain the reason for your opinion?
- Q.4 Out of various forms of CPD,
 - a) Some emphasise more on evaluation of the teacher's development or performance whereas others put more emphasis on providing assistant to him/her than evaluation. Which forms do you think should be practiced in Delhi schools? Why?
 - b) Some such as mentoring may need more time and effort, more frequent contact between teachers and provide personal support along with professional support but they are often said to be useful. However, these activities may increase workload. What do you think policy makers should do to face this dilemma?

Q.5Further, CPD practices can

- a) Be designed by the schools or can naturally develop among the teachers. Which do you think policy makers should prefer to do? Why?
- b) Include assistance for the teacher's development or this assistance, sometimes, is followed by evaluation of his/her progress. Which do you think should be practiced in Delhi schools? Why?

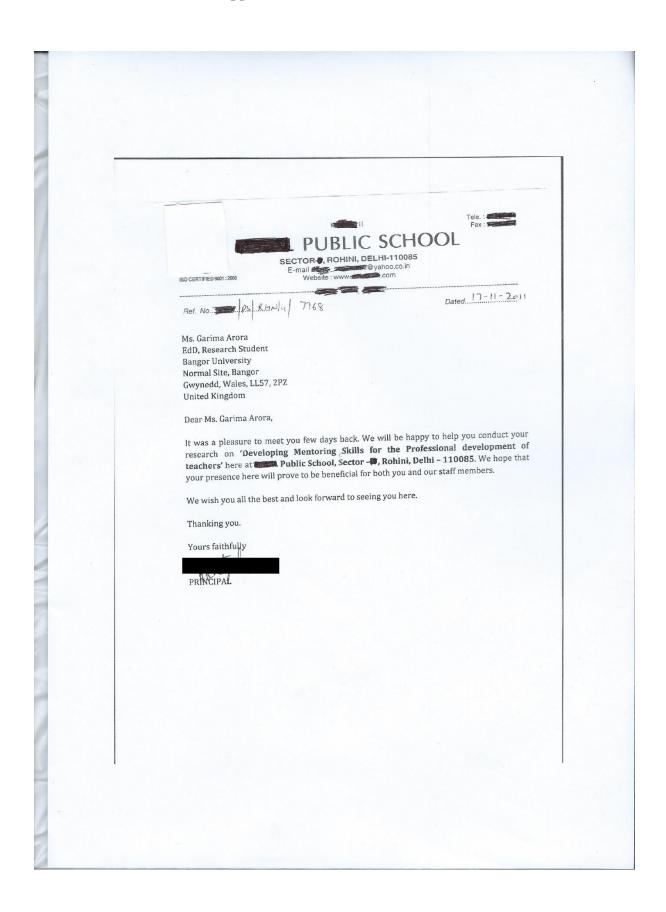
Q.6Which features of CPD, overall, do you think should be practiced in Delhi schools? Why do you think they are more suitable to Delhi schools?

Many thanks for your time. Do you have anything to add? Or any questions to ask?

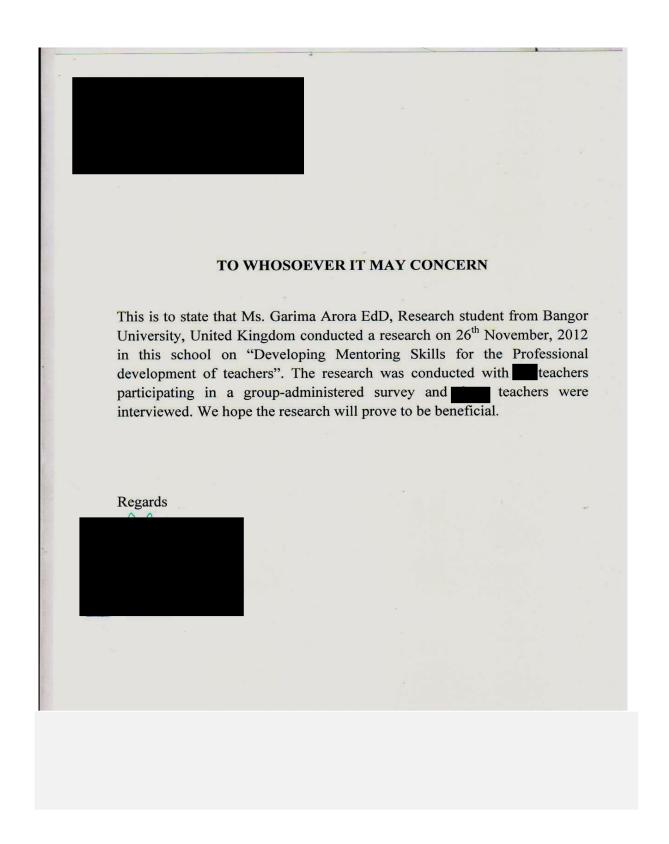
Appendix-5: Consent of School-A

P. C.			
			Recog. by Directorate of Edu., Govt. of N.C.T., Delhi Aff. to C.B.S.E., Ministry of H.R.D., Govt. of India
	_	PUBLIC SCHOOL	/ International School Award
		Ref. No. :	Dated : .Ω8
	*	Dear Ms. Garima	
		It is our pleasure to inform you	that you may go ahead with
		your research in our School.	
		Principal	
	*		
		Tel.: Fax: e-mail:	Delhi-110034 @vsnl.com website: www.

Appendix-6: Consent of School-B



Appendix-7: Consent of School-C



Appendix-8: Consent of MCD

Deputy Director of Education Depositment Rohini - Sector-5 Delhi - 110095 Subject: - Approval to work with 3 MCD school Teachers. I am a research Student at Bangor University, UK and pursoing EdD (Doctorate of Education). I am conducting a research (attached proposal) with various schools in Delhi. The research committee includes P. with Dr and Dr. Chair of research committee. I would like to request you to grant me permission to work with teachers from three different schools. An intial permission has granted by is during a Jele phonic Conversation (Additional Commissioner of Education) betweenMr A Inspector - Mrs. and School Telaphun connerathur with nr. Podall. com (Edu) Regards allows her Three M-CD. Primary GARIMA AROT School for her research EdD Research Sholant 1 MCD Mimary School Sec Bangar University (2) M. C. D Primary school See- 4 Mormal Site. Bangar, UK, LL57 2P2

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Appendix-9: Individual Participation Consent Form



Bangor University's 'Code of Practice for the Assurance of Academic Quality and Standards of Research Programmes'

School of Education

Participant Consent Form

Researcher's name- Miss Garima Arora

The researcher named above has briefed me to my satisfaction on the research for which I have volunteered. I understand that I have the right to withdraw from the research at any point. I also understand that my rights to anonymity and confidentiality will be respected.

I agree to having the interview	recorded.
Signature of participant	
Date	

This form will be produced in duplicate. One copy should be retained by the participant and the other by the researcher.

Please turn over the sheet for more details.

PROJECT DETAILS

This research study is conducted by Miss Garima Arora (An EdD Research Student) with a team from the Department of Education at Bangor University, UK.

The team includes Professor Anwei Feng and Dr. Charles Buckley with Dr Enlli Thomas as Chair of the research committee. This project is approved by the Bangor University Ethics Committee Board, UK.

The provisional title for the research project is 'Schools' perspective & attitude about Continuous Professional Development (CPD): A case study in Delhi schools'. Estimated duration of the research project is 1½ years. The aim of the research project is to explore the existing behaviour of teachers among themselves and their attitudes and perceptions about CPD. This project is inspired by a recent pilot phase study 'Mentoring⁷ in Delhi Schools' (MINDS, 2010) which was conducted by UKIERI, with the collaboration of The Open University, UK and Delhi University, India, in 11 Delhi Schools.

Data will be collected by using questionnaires and semi-structured interviews. Findings will be included in my thesis towards the EdD degree.

If you have any question regarding your rights as a research participant, you may contact:

Research Ethics Coordinator

School of Education Bangor University, Normal Site, Bangor, Gwynedd LL57 2PZ

Tel: +44 (0) 1248 383082 Fax: +44 (0) 1248 383092 Email: education@bangor.ac.uk

If you have any questions or concerns about the research, please feel free to contact:

Miss Garima Arora EdD Research student School of Education Bangor University, Normal Site, Bangor, Gwynedd **LL57 2PZ**

Phone no: +44 7805169377

Email: edpcab@bangor.ac.uk

⁷ Mentoring- It is a form of CPD.

Appendix-10: Questionnaire-Hindi Translation

पृष्ठ 1



बैंगर यूनिवर्सिटी, इंग्लैंड अध्यापकों के लिए प्रश्नावली

खंड—1 व्यक्तिगत सूचनाः (प्र1 और प्र2 के लिए उपयुक्त विकल्प पर निशान (√) लगाएं)

1.	लिंगः पुरुष महिला
2.	आयु समूहः 25 या कम 26-30 31-35 36-40 41-45 46 या अधिक
3.	अध्यापक के तौर पर आपका अनुभव (कितने वर्ष)
4.	इस स्कूल में अध्यापक के तौर पर आपका अनुभव (कितने वर्ष)
5.	प्राप्त योग्यता की डिग्री / डिग्रियां:
B	अध्यापन को विषय:

(ध्यान दें: निम्निलिखित खंड के वक्तव्यों में 'सहकर्मी' शब्द ऐसे व्यक्ति से संबंधित हो सकता है जिसे आपके स्कूल द्वारा सुपरवाइजर या सुपरवाइजर के अंतर्गत, सलाहकार या सलाहकार के अंतर्गत निर्धारित किया गया है या वह आपका सहकर्मी, सीनियर (विरिष्टा) या जुनियर (किनिष्टा) अध्यापक, विमागध्यक्ष (एवओडी) या प्रधानाध्यापक (प्रिसीपल) हो सकता/सकती है।)

खंड—2 कृपया बावीं ओर के कॉलन में दिए गए वक्तव्यों को ध्यानपूर्वक पढ़ें और दावीं ओर के कॉलन में आपकी राय को सबसे बेहतर तरीके से बताने वाली संख्या पर निशान (√) लगाएं। 1 = कमी नहीं से लेकर 5 = हमेशा तक

क्र.सं.	वयत्तव्य	1	2	3	4	5
1.	मेरी एक सहकर्मी मेरे काम की योजना बनाने में मेरी सहायता					
	करती हैं।					
2.	में अक्सर अपने सहकर्मी की उनके काम की योजना बनाने में					
	मदद करता / करती हूं।					
3.	मेरी एक सहकर्मी अध्यापक कार्य के तकनीकी पहलुओं को					
	सीखने में मेरी सहायता करती हैं।					\Box
4.	में अपने सहकर्मी की अध्यापक कार्य के तकनीकी पहलुओं को					
_	सीखने में सहायता करता / करती हूं।					
5.	मेरी सहकर्मी कार्य सीखने के नए अवसरों के बारे में मुझे सलाह देती हैं।					
6.	पता है। मैं अपने सहकर्मी को सीखने के नए अवसरों के बारे में सलाह					
О.	न जपन तहकना का ताखन के नए जवतरा के बार न तलाह देता / देती हैं।					
	दता/दता हूं।					
7.	मेरी सहकर्मी मुझे मेरे काम के बारे में फीडबैक (प्रतिपुष्टि) देती					
	हैं।					
8.	मैं अपने सहकर्मी को उनके काम के बारे में फीडबैक (प्रतिपुष्टि)					
	देता / देती हूं।					
9.	मेरी सहकर्मी मेरे अध्यापक कार्य को बेहतर करने में मेरी सहायता					
	करती हैं।					
					<u> </u>	
10.	मेरा अपने सहकर्मी के साथ लंबे समय तक चलने वाला पेशेवर					
42	सबंघ है। मैं अपने सहकर्मी का एक व्यक्ति के तौर पर वास्तव में ख्याल					
12.						
13.	रखता / रखती हूं। मेरी एक सहकमी दबाव के समय में मुझे सहारा देती हैं और मुझे				 	\vdash
13.	नेश एक सहकता देवाव के समय न नुझ सहाश देता है आर नुझ प्रोत्साहित करती हैं।				l	
14.	में स्कूल की वर्तमान प्रक्रियाओं के उपयोग द्वारा मेरे पेशेवर				\vdash	$\vdash \vdash \vdash$
14.	विकास के बारे में प्रसन्म और संतुष्ट हूं।				l	

पृष्ठ 1

 में सलाह की अवधारणा (विचार) को समझता / समझती हू।
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खंड–3

यह खंड आपके मौजूदा स्कूल में पेशेवर विकास की प्रक्रियाओं की विशेषताओं के लिए आपकी प्राथमिकता से संबंधित है। आप अपने पेशेवर विकास के लिए अपनी प्राथमिकता के आधार पर 1 से लेकर 6 तक किसी नी बॉक्स में निशान (√) लगा सकते हैं। 1 = सबसे कम पसंदीदा से 6 = सबसे अधिक पसंदीदा

1. किसी सहकमी द्वारा आपको समग्न प्रदर्शन का लिखित फीडबैक 2. किसी सहकमी द्वारा आपको अध्यापक प्रक्रिया का संक्षिप्त व सीधा मुल्यांकन 3. आपको प्रगति का बार-बार और निरंतर मूल्यांकन 4. आपको पेरोवर विकास पर अधिक समय खर्च करना 5. पेरोवर विकास प्रक्रियाओं में जुड़ने से कार्यभार का अधिक होना 6. आपको सहकमी द्वारा कक्षा में काम देखना (उससे सीखने के तिए या उसे सिखाने के तिए) 7. आपको सहकमी द्वारा आपको स्वतंत्र कार्य/अध्यापन शैली में हरराक्षेप करना 8. सहकमी द्वारा आपको वर्तमान अध्यापक प्रक्रिया की आलोचना करके इसका सकारात्मक उपयोग करना 9. पेरोवर विकास प्रक्रियाओं में निरंतर शामिल रहना 10. आपको सहकमी के पेरोवर विकास की जिम्मेदारी लेना 11. आपको सहकमी के पेरोवर विकास की तिए वचनबद्ध होना 12. आपको पेरोवर या व्यक्तिगत समस्याओं पर बात करने के तिए अपने सहकमी पर भरोसा करना 13. अपनी कम जानकारी के तिए आलोचना होने के डर के बगैर तत्परता के साथ सहायता मांगना 14. किसी व्यवित को आपको पेरोवर विकास में आपकी व्यक्तिगत सहायता करने के तिए कहना 15. अपने अध्यापक अनुभव व ज्ञान को अच्च सहकमी के साथ बांटना 16. आप अपने जूनियर सहकमियों से मी सीख सकते हैं 17. अपने पेरोवर विकास के तिए सीनियर या जूनियर दोनो तरह के अध्यापकों को बराबर अहमियत दोना 18. अपने पेरोवर व्वक्तिस के तिए सीनियर या जूनियर दोनो तरह के अध्यापकों को बराबर अहमियत दोना 18. अपने पेरोवर व्वक्तिस के तिए सीनियर या जूनियर दोनो तरह के अध्यापकों को बराबर अहमियत दोना 19. आपके तिए पर्ववेक्षक युनने की पसदीदा अपने सहकमी के साथ लंबे समय तक चलने वाला संबंध कायम करना 19. आपके तिए पर्ववेक्षक युनने की पसदीदा अपने संगठन को देना (आपको द्वार वान को नम करनत)	700 700	पेशेवर विकास गतिविधियों की विशेषताएं	1	2	3	4	5	
 2. किसी सहकर्मी द्वारा आपकी अध्यापक प्रक्रिया का सक्षिप्त व सीघा मूल्याकन । 3. आपकी प्रगित का बार—बार और निरंतर मूल्यांकन । 4. आपके पेरोवर विकास पर अधिक समय खर्च करना । 5. पेरोवर विकास प्रक्रियाओं में जुड़ने से कार्यभार का अधिक होना । 6. आपके सहकर्मी द्वारा कक्षा में काम देखना (उत्तसे सीखने के तिए या उसे सिखाने के तिए) । 7. आपके सहकर्मी द्वारा आपके स्वतंत्र कार्य / अध्यापन रौती में हस्तक्षेप करना । 8. सहक्रमी द्वारा आपकी वर्तमान अध्यापक प्रक्रिया की आलोधना करके इसका सकारात्मक उपयोग करना । 9. पेरोवर विकास प्रक्रियाओं में निरंतर शामिल रहना । 10. आपके सहकर्मी के पेरोवर विकास के लिए वामबद्ध होना । 11. आपके सहकर्मी के पेरोवर विकास के तिए वामबद्ध होना । 12. आपकी पेरोवर या व्यवितगत समस्याओं पर बात करने के तिए अपने सहकर्मी पर मरोसा करना । 13. अपनी कम जानकारी के तिए आवीचना होने के डर के बगैर तत्परता के साथ सहायता मांगना । 14. किसी व्यवित को आपके पेरोवर विकास में आपकी व्यवितगत सहायता करने के तिए अपने अध्यापक के तिए कहाा । 15. अपने किस को अपके पेरोवर विकास के किए सहकर्मी के साथ वाटना । 16. आप अपने ज्येत विकास के तिए सीनियर या ज्यित विकास के साथ वाटना । 17. अपने पेरोवर विकास के तिए सीनियर या ज्यित दोनो तरह के अध्यापकों को बराबर अहमियत देना । 18. अपने पेरोवर व व्यवितगत विकास के तिए अपने सहकर्मी के साथ लंबे समय तक बलने वाला संबंध कायम करना । 19. अपने पेरोवर का व्यवितगत विकास के तिए अपने सहकर्मी के साथ लंबे समय तक बलने वाला संबंध कायम करना । 19. आपके तिए पर्यवेक्षक पुनने की पसदीदा अपने संगठन को देना (आपके हाश सुने जाने के स्थान पर) जो आपके पेरोवर विकास में आपकी में बद करनको । 	क्र.स.	परावर विकास गातावाधवा का विश्वनताए	1	2	3	7	Ð	6
गुल्यांकन 3. आपकी प्रगति का बार—बार और निरंतर मूल्यांकन 4. आपके पेरोवर विकास पर अधिक समय खर्च करना 5. पेरोवर विकास प्रक्रियाओं में जुड़ने से कार्यभार का अधिक होना 6. आपके सहकमी द्वारा कहा। में काम देखना (उससे सीखने के लिए या उसे तिखाने के लिए) 7. आपके सहकमी द्वारा आपके स्वतंत्र कार्य / अध्यापन शैली में हस्तक्षेप करना 8. सहकमी द्वारा आपकी वर्तमान अध्यापक प्रक्रिया की आलोधना करके इसका सकारात्मक उपयोग करना 9. पेरोवर विकास प्रक्रियाओं में निरंतर शामिल रहना 10. आपके सहकमी के पेरोवर विकास की जिम्मेदारी लेना 11. आपके सहकमी के पेरोवर विकास की लिए वचनबढ़ होना 12. आपनी पेरोवर या व्यवितगत समस्याओं पर बात करने के लिए अपने सहकमी पर मरोसा करना 13. अपनी कम जानकारी के लिए आलोधना होने के डर के बगैर तत्परता के साथ सहायता मांगना 14. किसी व्यवित को आपके पेरोवर विकास में आपकी व्यवितगत सहायता करने के लिए कहना 15. अपने अध्यापक अनुमव व झान को अच्च सहकमी के साथ बाटना 16. आप अपने जृनियर सहकिंगियों से नी सीख सकते हैं 17. अपने पेरोवर विकास के लिए सीनियर या जूनियर दोनों तरह के अध्यापकों को बरावर अहिंगियत येना 18. अपने पेरोवर विकास के लिए सीनियर या जूनियर दोनों तरह के अध्यापकों को बरावर अहिंगियत है लिए अपने सहक्मी के साथ लंबे समय तक बलने वाला संबंध कायम करना 19. आपके लिए पर्यवेसक मुनने की परादीदा अपने संगठन को देना (आपके द्वारा चुने जाने के स्थान पर) जो आपके पेरोवर विकास में आपकी मदद करसको	1.							
 अापकी प्रगिति का बार—बार और निरंतर मूल्यांकन। आपके पेरोवर विकास पर अधिक समय खर्च करना। पेरोवर विकास प्रक्रियाओं में जुड़ने से कार्यभार का अधिक होना। आपके सहकर्मी द्वारा कक्षा में काम देखना (उससे सीखने के तिए या उसे तिखाने के तिए)। आपके सहकर्मी द्वारा आपके स्वतंत्र कार्य/अध्यापन शैली में हस्तक्षेप करना। सहकर्मी द्वारा आपके वर्तमान अध्यापक प्रक्रिया की आलोधना करके इसका सकारात्मक उपयोग करना। आपके सहकर्मी के पेरोवर विकास को जिम्मेदारी लेना। आपके सहकर्मी के पेरोवर विकास को जिम्मेदारी लेना। आपके सहकर्मी के पेरोवर विकास के तिए वचनबढ़ होना। अपने सहकर्मी पर मरोसा करना। अपने कन जानकारी के तिए आलोधना होने के डर के बगैर तत्परता के साथ सहायता मांगना। किसी व्यक्ति को आपके पेरोवर विकास में आपकी व्यक्तिगत सहायता करने के तिए अपने तहायता करने के तिए कहना। अपने के अध्यापक अनुभव व झान को अध्य सहक्ष्मी के साथ बांटना। आप अपने ज्ञानकर सहायता मांगना। आप अपने ज्ञानकर सहायता मांगना। आप अपने क्ष्यापक अनुभव व झान को अध्य सहक्ष्मी के साथ बांटना। आप अपने ज्ञानकर सहायता करता ज़ान के अध्य सहक्ष्मी के साथ बांटना। आप अपने पेरोवर विकास के तिए सीनियर या जूनियर दोनों तरह के अध्यापकों को बराबर अहमियत देना। आप के समय तक बलने वाला संबंद कायम करना। आप के समय तक बलने वाला संबंदा अपने सहक्ष्मी के साथ लंबे समय तक बलने वाला संबंदा अपने संगठन को देना (आपके हारा चुने जाने के स्थान पर) जो आपके पेरोवर विकास में आपकी मदद करसके। 	2.	किसी सहकर्मी द्वारा आपकी अध्यापक प्रक्रिया का संक्षिप्त व सीधा						
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विकास में आपकी मदद करसके।	19.							
		देना (आपके द्वारा चुने जाने के स्थान पर) जो आपके पेशेवर						
	20.	एक पदसोपान क्रम व्यवस्था जिसमें सीनियर सामान्य तौर पर						
जूनियर अध्यापकों को बताते हैं कि क्या किया जाए।		जूनियर अध्यापकों को बताते हैं कि क्या किया जाए।						

-						गतिविधि		में साझा	करना	चाहेंगे

आपके समय और प्रयास के लिए आपका बहुत-बहुत धन्यवाद।

Appendix-11: Pre-Coded Scheme for Questionnaire

<u>Section-1</u> **Personal Information:** (Tick ($\sqrt{}$) the appropriate option for Q.1 and Q.2)

1.	Gender: M F
2.	Age group: 25 or below 26-30 31-35 36-40 41-45 46 or above
3.	Your experience (how many years) as a teacher
4.	Your experience (how many years) as a teacher in this school:
5.	Qualification degree/s achieved:
6.	Teaching Subject/s:

(Note: The term 'colleague' in the statements of the following sections refers to a person who may be designated by your school as supervisor or supervisee, mentor or mentee or s/he may be your co-worker, senior or junior teacher, head of the department (HOD) or principal.)

<u>Section-2</u> Please read the statements provided in the left-hand column carefully and tick ($\sqrt{}$) the number in right-hand column that best reflects your view. 1= Never to 5= Always

S.no.	Statement	1	2	3	4	5
1.	I have a colleague who helps me in the planning of my work.					
2.	I often help my colleague to plan his/her work.					
3.	I have a colleague who assists me in learning the technical aspects of teaching job.					
4.	I assist my colleague in learning the technical aspects of teaching job.					
5.	I have a colleague who advices me about new learning opportunities.					
6.	I advice my colleague about new learning opportunities.					
7.	I have a colleague who gives me feedback regarding my work.					
8.	I give feedback to my colleague regarding his/her work.					
9.	My colleague helps me to reflect on my teaching practice.					
10.	I am involved in a long-term professional relationship with my colleague.					
11.	I have a colleague who genuinely cares for me as a person.					
12.	I genuinely care for my colleague as a person.					
13.	I have a colleague who provides support and encouragement to me in stressful times.					
14.	I feel happy and satisfied about my professional development with the use of current practices in the school.					
15.	I understand the concept of mentoring.					

Section-3

This section relates to your preferences for the features of professional development practices in your current school. You can tick ($\sqrt{}$) any box out of 1 to 6, based on your preferences for your professional development.1=Least preferred to 6= Most preferred.

S.no.	Features of professional development activities	1	2	3	4	5	6
1.	Written feedback of your overall performance by a colleague.						
2.	Brief and direct evaluation of your teaching practice by a colleague.						
3.	Frequent and continuous evaluation of your progress.						

APPENDICES

4.	Spend more time on your professional development.		
٦.	spend more time on your professional development.		
5.	Increase in workload by involving in professional		
	development practices.		
6.	Class observation by your colleague (to learn from him		
	or to help him learn).		
7.	Intervention in your independent working/teaching		
	style by your colleague.		
8.	Make positive use of criticism of your current teaching		
	practice by a colleague.		
9.	Continuous involvement in professional development		
10	practices.	+	
10.	Take responsibility for the professional development of your colleague.		
11.	Commitment towards the professional development of		
	your colleague.		
12.	Trust on your colleague to discuss your professional or		
	personal problems.		
13.	Readily ask for help without the fear of being		
1.4	criticised for your lack of knowledge.		
14.	Ask somebody to personally assist you in your		
15.	professional development.	+	
15.	Share your teaching experience and knowledge with another colleague.		
16.	You can learn from your junior colleagues .		
10.	Tou can learn from your junior concagues.		
17.	Give equal importance to both, senior or junior,		
	teachers for your professional development.		
18.	Involvement in a long term relationship with your		
	colleague for your professional and personal		
1.5	development.		
19.	Give priority to your organisation to choose an		
	observer for you (instead of one chosen by you) who		
20	can help in your professional development.	+	
20.	A hierarchical structure in which seniors simply tell		
	juniors what to do.		

Please provide any other comments you would like to share about your current professional development
activities

Many thanks for your time and effort.

S.no.	Features of CPD activities	Continuum of coding (1	No. of questions
		to 6)	per feature
1.	Level of evaluation -LOE	Q.1-3-ISF	3
2.	time and workload -TW	Q.4-5-SIF	2
3.	interference and criticism by colleague-IC	Q.6-8-SIF	3
4.	continuation in contacts-CC	Q.9-SIF	1
5.	Commitment and responsibility- CR	Q.10-11- SIF	2
6.	trust on another colleague -T	Q.12-13-SFI	2
7.	intensity of exchange or sharing information-E	Q.14-15-SFI	2
8.	Reciprocity or degraded hierarchy -R	Q.16-17-SFI	2
9.	length of process-TP	Q.18-SFI	1
10.	degree of independence to choose-H	Q.19-20-IFS	2

Appendix-12: Calculations from MS-Excel File

CANDIDATE-1

For Section-2

2.1	2.2	2.3	2.4	2.5	2.6	2.7	2.8	2.9	2.10	2.11	2.12	2.13
5	5	3	4	4	3	5	3	5	3	3	4	3

Existence of Mentoring- Mean (2.1 to 2.13) = 4 = Very Frequently

1	2.14	Level of
		Satisfaction
	5	5

2.15	Term
	Familiarisation
4	4

For Section-3

3.1	3.2	3.3	LOE	3.4	3.5	TW	3.6	3.7	3.8	IC	3.9	CC	3.10	3.11	CR
6	6	6	6	5	5	5	6	5	5	5.3	5	5	5	5	5
			FM			FM				FM		FM			FM

3.12	3.13	T	3.14	3.15	Е	3.16	3.17	R	3.18	TP	3.19	3.20	Н
5	6	5.5	5	4	4.5	6	6	6	5	5	6	5	5.5
		IM			IM			IM		IM			S

MODE-FM

Appendix-13: Documents from School-A

In today's arena of globalization, RDPS has made sustained efforts to bring an international acumen in its activities. It can be substantiated by the school's involvement in *Multicultural Students & Staff Exchange Programmes* with prestigious schools in countries such as UK, Germany, France, Italy and Singapore, New Zealand, Australia and others.

Teacher Training Programmes (TDPs) at RDPS are conducted as the process of enhancing the skills, capabilities and knowledge of teachers. As the education industry is undergoing transformation, so is the role of teacher. Teachers' role is more of a facilitator now. Training process moulds the thinking of teachers and leads to quality performance by them. It is continuous and never ending in nature.

Professional Development of teachers is done at three levels:

Beginner level of Teacher Empowerment -

RDPS is committed to integrate new employees into the organisation as effectively as possible by providing them with the information, support and training to become productive and satisfied members of the organisation. The new appointee and teachers with experience of 0-3 years fall in this category. They are coached or mentored either by the class coordinator or senior faculty member who is at the stage of sustaining empowerment i.e. the self- committed for life- long learning. The areas of mentoring involve Lesson planning and its presentation in sync to the school mission, awareness of the school process and procedures related to the concerned class level and awareness of school resources including the ICT for integration in the teaching- learning process.

<u>Intermediate level of Teacher Empowerment</u> (3- 8 yrs experience)- This stage shows the growth of Teacher as an empowered individual who is aware that he/she is provided professional development opportunities by various inbuilt formal and informal mechanisms to improve their instruction. The training at this stage leads to

- Increased confidence and self- respect as professionals
- Evolved subject knowledge.

<u>Advanced or Sustenance Level of Empowerment(</u> 8+ yrs exp)- At this stage, teachers understand the importance of lifelong learning, start valuing relationships with colleagues, devise strategies for classroom learning through group involvement. The professional development programme at this level leads to:

- Improvement of self-efficacy through student success
- Maturing sense of Autonomy through involvement in decision-making
- Sharing and exchange of ideas through Research and Development

Appendix-14: Documents from School-B

In Service Training and Development

Training program in an organisation is a process by which people are taught with skills and given the necessary knowledge or attitude to enable them to carry out their responsibilities to the required standard in the present job and to undertake greater and more demanding roles for effective job performance. Training program is also important in the education sector same as the other sectors or organisations. The need for training in education particularly for teachers is important to improve the quality of education in India. The success of a school curriculum is closely related to its effective implementation. Teachers have to be personally aware of the school curriculum, improve and enhance the necessary skills to interpret the concept changes accurately and to implement the modified curriculum according to its requirements, aims and objectives. As such, the need for inservice training or staff development programme for teachers plays an essential role in successful education reform. It also serves as a bridge between prospective and experienced educators to meet the new challenges of guiding students towards higher standards of learning and self development. In-service training has for many years been the driving force behind much changes that has occurred in the area of teaching and learning. As in any other profession, it is vital that teachers keep up to date on the most current concepts, thinking and research in their field. This, in turn supports in their 'lifelong learning' as educators, professionals and as individuals who are responsible for the education of the next generation. Teachers play and active and vital role in the development of productive and dedicated citizens.

Need of In-Service Training Programmes

For teachers, developing professionally means anticipating and governing the training process, rather than being governed by it. A few principles which can't be ignored when considering the professional development of teachers:

- 1. Along their career teachers go through professional cycles and a succession of learning experiences. Being professional teachers means not only being competent and expert teachers, but also being professionals of knowledge continually learned.
- 2. Teachers are reflective professionals; development implies continuous reflection on experience to devise new patterns of action, more conscious and effective.
- 3. Teachers are not only users of training courses, but also valuable resources to understand and renovate the process of teaching. Teacher research is as important as academic research.
- 4. Teacher professional development aims at improving student learning and achievement.
- 5. Teaching is a profession which adopts advanced standards not as means of control but as foundations of advanced performance.

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