

Continuous Professional Development (CPD) Model

Developed By:



Sindh Teacher Education
Development Authority (STEDA)

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School Education Department Government of Sindh, Karachi

1. Introduction of the CPD Model

This CPD model based on cluster-cum-school based approach. The professional development activities under the framework will be managed through a central elementary/ high school (referred as Cluster Hub School in the framework). The method of formation of clusters and selection of Cluster Hub Schools has been adopted from the 'School Clustering Policy 2016' and School Consolidation Policy (2012). The number of schools in a cluster will be 10 to 12, located within a radius of 15 kilometer from the Cluster Hub School/Campus School. The CPD will be delivered through blended mode:

- Face-to-face interaction of trainers (who are referred as Guide Teachers/Subject Coordinators in the framework) with teachers in workshop setting; (a) for all teachers within the school and/or at cluster level on regular basis for a short duration (two-hours to one day), and (b) for low performing teachers within Taulka/District for one week to four-weeks during vacations.
- On the job support through mentoring visits of schools by the trainers.
- **Online** support for teacher and trainers through a dynamic web-portal to be administered by a dedicated team of professionals based at PITE.

Key characteristics: The model represents a structure and approach to professional development of teachers that is different from that of other forms of professional development. It ensures peer coaching of teachers. The trainers (referred as Subject Coordinators in the framework) will be teachers of the same school or nearby school, who will support their peers in implementing the learnt knowledge and skills through professional development activities. The model combines the benefits of face-to-face meetings in the local setting, and self and peer study in between meetings where teachers apply what they learn, and reflect on the results. Moreover, the trainers will formally conduct fortnightly session of teachers of 2-3 schools assigned to her/him to discuss content and pedagogical issues faced by the teacher in the schools. The other trainers (referred as Guide Teachers in the framework) will also have mentoring visits of the schools within the cluster. They will also have quarterly a day-long conference at TEIs to discuss important problems and issues occurred and their solutions proposed during the quarter.

Contrasted with "training" that is characterized by an expert trainer who delivers content, the model functions democratically, with participants working collaboratively, sharing their expertise, reflecting on practices, and respecting each other's knowledge, experience and practices. Therefore, the model ensures that the development process is collaborative, with teachers of similar skill and confidence supporting, observing and coaching each other.

Focus: All primary and elementary school teachers will attend the professional development activities every year. Along with building capacity of teachers on reading skills, the teachers will get chance to improve their professional competence in other aspects of the languages (English and Sindh/Urdu) and also in other subjects including Science and Mathematics.

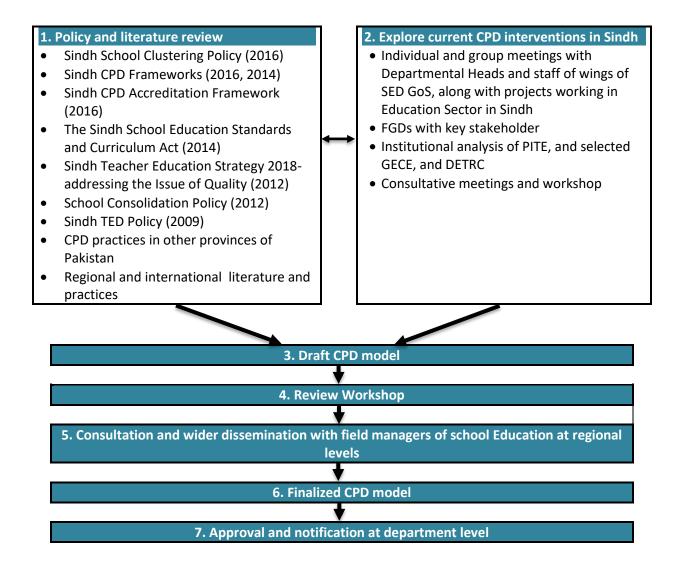
Management: At provincial level, PITE will take lead in managing all the CPD activities in the field as per the Sindh School Education Standards and Curriculum ACT 2014. At cluster level these activities will be managed by the Cluster Hub School/Campus School within a cluster (as per the School Clustering Policy 2016), and with the support of DEO, TEO and TEIs at district level. Primarily PITE, with support of BCEW and private organizations (to be identified by the School Education Department in consultation with STEDA and RSU), will be responsible for developing all type of training material. The content for the professional development activities will be derived from the training needs analysis. The focus of the material will be on Pedagogical Content Knowledge (PCK).

2. CPD Model Development Process

The processes and efforts for developing the CPD model were guided by a comprehensive and rigorously constructed conceptual framework informed by: a) the National Professional Standards for Teachers in Pakistan (2009); b) The Sindh School Education Standards and Curriculum Act, 2014; c) Sindh Education Sector Plan (SESP) 2014-18; and d) the Policy on 'School Clustering in Sindh, 2016.

2.1. CPD Strategic Planning: Key Processes

Development of CPD model process started by developing a consensus within School Education Department regarding how the strategic planning process would be carried out, as well as what the scope, timelines, key deliverables and guiding principles would be. The Figure 2.2 summarises the process.



3. The CPD Model for Elementary School Teachers in Sindh

3.1. Preamble

Nature of CPD programmes depends upon the requirements of a system by an individual working for the system. For elementary school teachers including literacy & Non Formal basic Education teachers providing their services to School Education Department, Government of Sindh (GoS), broadly three categories of professional development are envisaged:

A. Compulsory education and training- the CPD

- Professional development to meet National Professional Standards for Teachers (NPST) and School Curriculum Standards
- Recurring issues in education like multigrade teaching in schools with single, two or even three teacher
- Emerging issues in education/community to prepare staff for addressing these issue through various means including student counselling and parental education

B. Mandatory education and training

- **Induction trainings** to familiarize with School Education Department, understand role and responsible, and get ready to perform these roles as quickly as possible
- **Promotion linked trainings** to ensure that the staff has sufficient understanding of the new role and able to perform it efficiently

C. Academic and/or professional progression

 Career progression linked professional, like formal degree/certificate programmes, to encourage existing staff for enhancing their qualification

3.2. Arrangements for Compulsory Education and Professional Development

The CPD model agreed by the stakeholders, is for professional development of the primary and elementary school teachers to meet NPST and School Curriculum Standards. In the following lines, goals and target audience, bases and mean to measuring impact of the CPD, are described.

Goal and target Audience: The model has been evolved for CPD of primary and elementary school teachers including: ECT, SECT, PST, JST, JEST, EST, SEST; and HST, SST and SSST (if she/he is teaching in primary and/or elementary schools) and those working as facilitators/teachers in NFBE and literacy centres. The ultimate goal of the CPD is to improve quality of education in the province as per vision of the School Education Department, Gos and to meet National/Provincial Professional Standards for Teacher.

Bases of the CPD model: The model encompasses the provisions made in various policy guidelines on the CPD issued by the School Education Department from time to time. The model has mostly used terminology of these guidelines. One of the policy guidelines talks about the creating school clusters to managing delivery of education and ensuring quality of services (School Clustering Policy 2016); and another one, School Consolidation Policy 2012 Talks about the Campus schools. The School Clustering Policy 2016 also provides timelines for this task. If it takes more than expected timeframe given in the clustering policy (2016) to create School

Clusters and identify Cluster Hub School/ Campus Schools¹ (CHS/CS) to make them functional, School Education Department may constitute clusters for CPD only, in order to roll-out the CPD activities proposed in the model.

Measuring the impact of the CPD activities under the model: The model envisages professional development of teachers as a regular feature of School Education Department. It is mandatory for every teacher including literacy & non formal basic education teacher where it is possible to take part into it. The impact of the CPD will be measured through the students' achievement on annual basis. Special trainings for those teachers will be organized during the summer vacations whose students consistently performing lower than the expected level.

3.3. Arrangements for Mandatory Education and Training

For Induction Training

For all newly recruited teachers, induction training will be organized, immediately after the selection of the teachers. The training will include face-to-face component for at least two-weeks followed by a mentoring support in the school for one month through the proposed model. At the end, the trainee will come back to the institution from where she/he has attended the two weeks training in the beginning, for sharing her/his experiences and her/his performance evaluation. All the trainees will be evaluated before their regular appointment in the system.

For Promotion Linked Training

Those teachers whose promotion is due in near future, will undergo a promotion linked training. Generally, the trainings will be organized in summer vacation. The duration and other requirements of the training will be determined by the School Education Department, keeping in view the nature of the position for which the trainees will be aspired for. The process could be adopted for the time scale progression.

3.4. Arrangements for other Trainings

For Career Progress

Teachers' will be encouraged to improve their qualification, a) to meet the minimum requirements of the system, and b) to get higher positions in the system. For this, the teacher will have to undergo accredited programmes offered though modular approach by the School Education Department in collaboration with a degree awarding institution² and/or attending programme at a degree awarding institution.

¹ AS per School Consolidation Policy 2012

² Accredited by STEDA

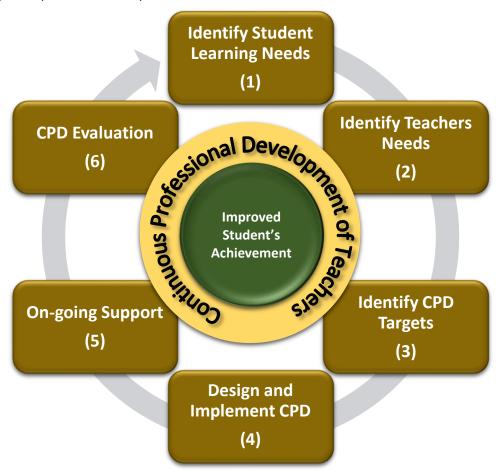
3.5. Premises of the Model

The proposed CPD model is:

- based on identified teacher needs to address school curriculum objectives and support School Education Department in achieving its vision and following its mission
- used for improving students' achievement
- providing access to all teachers for their professional development at their school level
- delivered through participatory approaches
- an ongoing process and requires an inbuilt mechanism to ensure support of teachers in classroom
- cost effective, as it reduces the travelling of the teachers for their professional development, to a large extent
- sustainable by making it part of administrative and staff's appraisal system

4. The CPD Model

The figure depicts the overall process of the CPD model for Sindh



Explanatory Notes

- Step 1. To begin with, student learning needs will be identified by using reports of large scale assessment (e.g. PEACe and SAT reports) based on provincial/national curriculum standards for all classes, and afterwards data to be gathered from CPD programmatic activities (e.g.: quarterly student assessment, students work samples, and Subject Coordinator observations)
- Teacher professional development needs (to address student learning needs) will be identifying by using National Professional Standards for Teachers in Pakistan (NPSTP) and studies conducted with particular reference to elementary school teachers performance in Sindh, and classroom assessment and CPD programmatic activities
- Step 3. CPD interventions will be identified that will be aligned with targeted areas emerged from data gathered under steps 1 and 2.
- Step 4. After development of CPD activities/materials, it will be got accredited from STEDA before implementation.
- Step 5. DETRCs, REECs, TRCs, In-service TEIs (and where necessary GCEs and GECEs also), DEOs will be engaged for training, mentoring and monitoring at Taluka, Cluster and School levels
- Step 6. Evaluation of the CPD programmes will be carried out by the implementing institution/agency, and also could be done by other institutions including public and private organizations and authorities

4.1. Flow of the CPD Activities under the Model

- i. The Guide Teachers³ will attend a training programme at Taluka/district level, keeping in view the number of Guide Teachers in the surrounding. For this purpose, the venue will be CHS/CS situated at Taluka headquarter and/or for district level TEI (if exits) otherwise CHS/CS situated at district headquarter
- ii. Initially all teachers will attend a week-long training delivered by the Guide Teachers at cluster level, afterwards selected teachers will work as subject coordinators⁴ for providing mentoring support to other the teacher of nearby 2-3 schools.
- iii. During a month, the Guide Teacher⁵ will visit at least 2-3 schools within her/his cluster to have direct observation of the teaching learning activities in the schools.
- iv. Each Subject Coordinator will document the mentoring session highlights including clearly defined problem and its solution (if it has found)
- v. In a month each Guide Teacher will hold at least one meeting with the teachers and subject coordinators to discuss problem(s), they have come across with, to find out its solution. The problem may be in content area and/or pedagogy of the subject.
- vi. On the last day of alternate month, Guide Teachers of the same Taluka/District will meet with a designated TEI faculty of the district, in case there is no TEI within the district, they meet with designated TEI faculty of neighbouring district.
 - The faculty will share at least one of the recent developments in the teaching of the subjects.
 - The faculty will discuss the solution of the problem with Guide Teachers, and share its solution, if she/he could.
 - In either case, the faculty will post the problem and its solution (if she/he had) on the discussion board of the SEEN⁶ for its wider dissemination and benefit, and seeking alternate solution(s) of the problem.
- vii. All the Guide Teachers of a district will have quarterly⁷ a day-long conference at a TEI to discuss important problems and issues occurred during the quarter. In this meeting sample work of students including answer sheets of the students' quarterly assessments will also be analysed to monitor the student progress and to identify misconception(s) if any.
- viii. All these activities will jointly be supervised by the DEO (Primary) and/or DEO (Elementary, Secondary and Higher Secondary)⁸ and the head of TEI in the district, and approved by the concerned Director School Education.

³ Complete a certified training to be determined by PITE in consultation with STEDA

⁴ Two subject coordinators: one for mathematics and Science, and other for English and Sindhi/Urdu. These coordinators will be teachers of the schools for which they will act as subject coordinator

⁵ The travelling and other expenses incurred by Guide Teachers for CPD activities, will be facilitated through regular budgetary provision to be available for the CHS/CS

⁶ Sindh Elementary Education Network (a proposed web-portal for CPD)

⁷ There will be 3 conferences each year.

⁸ Keeping in view administrative control of CHS/CS

4.2. Cluster Mapping under the Model

As per School Clustering Policy (2016) and/or School Consolidation Policy (2012), the Cluster Hub School (CHS)/Campus School (CS) will be centre of CDP activities in the cluster. The school should have adequate facilities and ideally be situated in or closer to a town centre where other social and commercial services are available. Under the policy provisions, following are key considerations for selection of the CHS/CS:

a. relatively good potential access

Centrally located and be accessible for other schools in the cluster through public transport or walking distance

b. comparatively high enrolment and students' retention

c. better resourced in terms of teachers

Well-resourced in terms of number of teachers (more than 5 in case of a primary or middle school, more than 8 in case of an elementary school, and more than 10 in case of a secondary school — sufficient number of subject teachers should also be available)

d. well-equipped and better resourced in terms of physical facilities

Sufficient number of rooms are able to allocate at least one room for cluster activities; and facilities such as a boundary wall, drinking water, electricity, toilet, furniture for teachers and students. Any residual need for improving facilities can be taken up with relevant authorities.

e. One level higher

At least a middle or secondary in case of all primary schools in the cluster. In other cases, one level higher than the other school in the cluster. If there is no middle/elementary or secondary school in the cluster, then the main primary school will be upgraded to elementary level following due process.

There will be multiple types of school clusters categorized as follows:

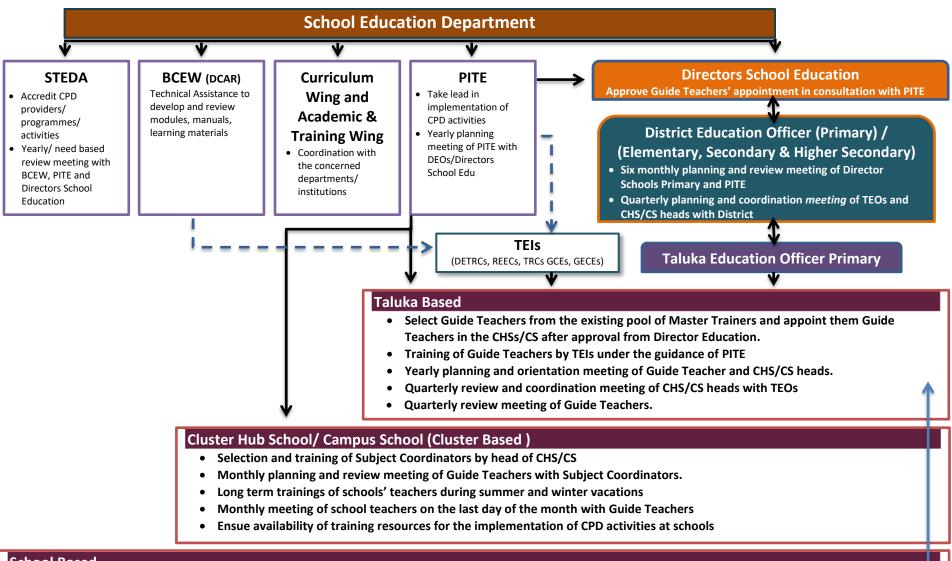
- i. School cluster with all primary schools: **Primary Cluster**;
- ii. School cluster with one middle or elementary school: Elementary Cluster;
- iii. School cluster with one secondary school: **Secondary Cluster**;
- iv. School cluster with Campus School as the Guide School: Campus School Cluster.

4.2.1 Multi-Grade Teaching:

Most pre-service and in-service teacher training systems prepare teachers to teach in monograde schools with a perception that teachers teaching in multi-grade contexts will adapt the learning and adjust their teaching accordingly.

In order to address the issues related to multi-grade teaching, STEDA with the support of PITE, BoC and European Union have piloted this model for multi-grade school teachers (developed four manuals by PITE & certified by STEDA) in the newly formed 13 clusters under the 2016 notified School Clustering Policy of the Government, in District Shaheed Benazirabad.

Implementation Process of the CPD Model 4.3.



School Based

- Nomination of two Subject Coordinators (one for mathematics and science, and other for English and Sindhi/Urdu) for 2-3 schools (to be identified by Guide Teachers within the 2-3 schools) by CHS/CS head
- Fortnightly meeting (after school timings for 2 to 3 hours) of the 2-3 schools' teachers and Subject Coordinators
- Monthly at least one visit of the subject coordinators to every school (2-3 school) assigned to her/him for mentoring and academic supervision of the teachers
- Mentoring and academic supervision of teachers by Guide Teachers through un-announced visits

4.4. Role of Individual / Institutions Involved in the Implementation of CPD

The following section gives further clarity of roles and responsibilities of the institutions to be engaged in the implementation of CPD.

4.4.1. Provincial Institute of Teacher Education (PITE)

- Identify training needs of teachers with the help of BCEW (PEAC) and STEDA, and data available from SAT and regular student assessment under CPD and/or Department al/school assessments, and Guide Teachers' observations.
- Invite yearly planning meeting with the Directors School Education and DEO (Primary) / (Elementary, Secondary and Higher Secondary) at PITE.
- Develop annual training calendar.
- Develop training and learning materials in collaboration with BCEW.
- Coordinate with BCEW for the student assessment, support to curriculum and textbooks development.
- Coordinate with STEDA for accreditation programmes and materials.
- Train Guide Teachers and develop capacity of CHS/CS Heads, TEOs and DEO (Primary) / (Elementary, Secondary and Higher Secondary) to support and monitor the CPD activities.
- Coordinate quarterly planning and coordination meeting with the DEO (Primary) / (Elementary, Secondary and Higher Secondary) at the District level.
- Coordinate with DEO (Primary) / (Elementary, Secondary and Higher Secondary) for managing the CPD.
- Maintain the database of Guide Teachers, Subject Coordinators, and Teachers (PITE can also use the HRMIS being developed by the School Education Department and TEMIS to be developed by STEDA).
- Develop and maintain Sindh Elementary Education Network (SEEN) Portal for hosting online programmes and support⁹, also linking it ILMI messaging service¹⁰.
- Engage faculty of education of universities to conduct studies on CPD programmes including evaluation of CPD programmes.
- Organize annual conference of Guide Teachers.
- Organize national conference after every two years on CPD in collaboration with STEDA.

⁹ Place problems/ solutions of Sindh Elementary Education Network (SEEN).

¹⁰ An SMS complaint and help service called "Ilmi" for everyone connected with education - be it students, teachers, headmasters, parents or taluka or district officers

4.4.2. Sindh Teacher Education and Development Authority (STEDA)

- Ensure quality by accrediting and approving CPD programmes designed by PITE and / or by agency institution (public or private) engaged by PITE or the School Education Department.
- Contribute in identifying teachers' professional needs
- Develop selection criteria for selecting Guide Teachers
- Develop and implement rules of business to link CPD activities with teacher licensing
- Evolve and implement mechanism to ensure quality of CPD programme implementation
- Conduct research on teacher professional development
- Develop and maintain TEMIS
- Organize international conference after every five years on CPD

4.4.3. Bureau of curriculum and Extension Wing (BCEW) Sindh/ Directorate of Curriculum, Assessment and Research (DCAR)

- Assess students' achievements and conduct diagnostic assessments of teachers in Pedagogical Content Knowledge (PCK)
- Support PITE in developing teacher training material to address their identified needs
- Conduct research on teacher professional development
- Collaborate with PITE in curriculum and textbook development and evaluation to keep them abreast with latest development in the curriculum and bring contextual knowledge of classroom practices in textbook development and evaluation
- Contribute in developing Guide Teachers' trainings material

4.4.4. Reform Support Unit (RSU) of School Education Department (SED)

- Arrange resources to strengthen SED wings for adopting and implement the CPD model.
- Monitor the implementation of the CPD and assess its impact with help of technical assistance from development partners and/ donors by engaging private sector.
- Coordinate among the key institutions (like STEDA, PITE, BCEW) involved in the implementation of the CPD programme.

4.4.5. Director School Education Primary/ Secondary

- Liaison with PITE in developing plan for CDP activities and support in implementation of the developed activities
- Appoint Guide Teachers.
- Monitor and supervise CPD activities in their respective division.

4.4.6. District Education Officer (DEO) Primary/ Elementary, Secondary and Higher Secondary

- In consultation with PITE/TEIs, plan and coordinate CPD activities in the district.
- Approve cluster CPD activities plan.

- Provide support for CPD activities at Taluka/Cluster level.
- Monitor and review performance of clusters.

4.4.7. Taluka Education Officer (TEO)

- Under the guidance of PITE, respective TEI and DEO (Primary) / (Elementary, Secondary
 and Higher Secondary), and in close consultation with CHS/CS heads, ensure
 implementation of CPD activities of the clusters in her/his Taluka.
- Recommend Guide Teachers for CHS/CS
- Provide support for cluster level CPD activities.
- Monitor and review performance of clusters in delivering CPD programme.

4.4.8. CHS / CS Head

- Nominate Guide Teachers
- Lead teachers' professional development at cluster level.
- Facilitate implementation of the CPD activities at the cluster level.
- Arrange training resources for schools fall within the cluster
- Recommend budget to support Guide Teachers travel and other expense pertaining CPD activities

4.4.9. Guide Teacher

In addition to her/his regular role and responsibilities, she/he will perform the following:

- Receive training from TEIs.
- Conduct training of Subject Coordinators at cluster level.
- Conduct cluster level training of teachers.
- Visit schools for CPD supervision and facilitation.

Note: During selection of Guide Teachers, Female Guide Teachers should be preferred for Female Subject Coordinators.

4.4.10. Subject Coordinator

In addition to her/his teaching workload, she/he will perform the following:

- Receive training from Guide Teachers.
- Provide mentoring support to teachers in her/his subjects for the nearby 2-3 Schools
- Attend monthly meeting with Guide Teacher.

4.5. Key Personnel Involved in the CPD Program, their Selection and Roles and Responsibilities

There are three key persons, who will be responsible for implementation of the CPD in the field. The detail about these persons is discussed in this section.

4.5.1. Roles and Responsibilities

The following chart gives detail of the persons who will be involved in the CPD activities in the field.

Position	Responsibilities
TEI Faculty	i. Complete a certified training to be determined by STEDA
,	ii. Conduct training of Guide Teachers
	iii. Conduct a meeting of Guide Teachers of the same district on the last day of
	alternate month
	iv. Share at least one of the recent developments in the teaching of the subject
	during the meeting with Guide Teachers
	v. Post the problem and its solution (if she/he had) on the discussion board of
	the SEEN
	vi. Analyse sample answer sheets of the students' quarterly assessment exam to
	monitor the student progress and to identify misconception(s) if any (4 times
	in a year)
Guide Teacher	i. Complete a certified training to be determined by PITE in consultation with
	STEDA
	ii. Conduct training of subject coordinators and teachers
	iii. Conduct a meeting of subject coordinators of the same cluster on the last
	day of each month
	iv. Post the problem and its solution (if she/he had) on the discussion board of the SEEN
	v. Visit at least 2-3 schools in her/his cluster to have direct observation of the
	teaching learning activities
	vi. All the Guide Teachers of district will have quarterly a day-long conference at
	a TEI to discuss important problems and issues occurred and their solutions
	proposed during the quarter (total 3 conferences in a year)
Subject	i. Attend training at cluster level
Coordinator	ii. Conduct fortnightly session of teachers of 2-3 school assigned to her/him to
(English and	discuss content and pedagogical problems faced by the teacher in the
Sindhi/ Urdu,	schools
Mathematics	iii. Document the discussed problems with their proposed solution (if any)
and Science)	iv. Support peers in classroom delivery
	v. Attend a half day workshop at cluster level on monthly basis
Teacher	i. Attend a week long training during vacations
	ii. Attend monthly half day workshop at cluster level
	iii. Attend fortnightly meeting with Subject Coordinator in her/his school for 2-3
	hours

4.5.2. Selection Process and Jurisdiction

Below is the selection method and required numbers of the persons:

Position	Selection method	Area of jurisdiction	No. of persons required for the area
TEI Faculty	A faculty of a TEI (having expertise in science, mathematics or languages) within the district and/or from neighbouring district will be selected. The person should have studied the subject upto graduation level for which she/he is selected.	District	5 (one for each of the subjects: English, Mathematics, Science, Sindhi, Urdu)
Guide Teacher	A person with higher qualification in the subject and have minimum professional qualification (to be determined in the selection criteria) within Taluka and is based in CHS/CS	Cluster	2 [1 for mathematics and Science; and 1 for languages. (English, Sindhi/Urdu)]
Subject Coordinator Teacher	A teacher with better qualification in the subject(s) from the 2-3 nearby school grouped together for CPD activities. She/he will be identified on the basis of her/his assessment during their training.	2-3 schools grouped together for CPD activities	2 (1 for mathematics and Science, and 1 for languages)

4.5.3. Focus and Frequency of Face to Face Training

Frequency	Who should attend	Duration	Venue	Focus of training
Once a year	All teachers including the	One week	CHS/CS	TNA based (District/Taluka based)
Each month	Subject Coordinators	One day (half day for Science and Mathematics, and the reaming half day for languages)	CHS/CS	Emerging problem(s) relating to content area and/or pedagogy of the subject
Fortnightly	All teachers	Two hours after the closure of school	Own or nearby school	Problem(s) relating to implementation of the learnt skills
Yearly	Selected teachers whose students consistently perform low in a particular subject	2 to 4 weeks (depending on need). These trainings will be organized during vacations	District/ Taluka	The areas in which their students performed poorly

5. List of Abbreviations and Acronyms

ADB	Asian Development Bank
ADE	Associate Degree in Education
AEPAM	Academy of Educational Planning and Management
AIOU	Allama Iqbal Open University
AKU-IED	Aga Khan University – Institute for Educational Developmen
ASC	Annual School Census
BCEW	Directorate of Curriculum, Assessment and Research
BEd	Bachelor of Education
BISE	Board of Intermediate and Secondary Education
BoC	
BOCEW	Bureau of Curriculum and Extension Wing
BPS	Basic Pay Scale
CHS	Cluster Hub School
CIDA	,
CPD	· ·
CPE	Continuous Professional Education
СТ	0
DEMIS	District Education Management Information System
DEO	District Education Officer
DETRC	Divisional Education Training Resource Centre
DETRC	Divisional Educational Technology Resource Centre
DIE	Diploma in Education
DSE	Directorate of School Education
ECE	Early Childhood Education
ECT	,
Ed-Links	Ed-Links – Links to Learning Project (USAID)
EDO	
	Education for All
ELC	Education Leadership Centre
ELDC EMIS	Educational Leadership Development Centre
EMR	Education Management Information System
ESRA	8
ESRA	Education Sector Reform Assistance
EST	Elementary School Teacher
EU	European Union
GATTTC	Govt. Agro-Technical Teachers Training Centre
GECE	Government Elementary College of Education
GER	Gross Enrolment Rate
GoP	Government of Pakistan
GoS	Government of Sindh
GPEDP	Girls Primary Education Development Project
GPI	Gender Parity Index
GTZ	German Technical Cooperation
HEC	Higher Education Commission

- **HR** Human Resources
- **HST** High School Teacher
- **ICT** information and communication technology
- **ITE** Initial Teacher Education
- JEST Junior Elementary School Teacher
- JST Junior School Teacher
- **L&NFE** literacy & non formal education
 - **M&E** monitoring and evaluation
- M. A. Master in Arts
- MGT Multi-grate Teaching
- M.Phil Master in Philosophy
- **MDGs** Millennium Development Goals
 - **MEd** Master of Education
 - **MoE** Ministry of Education
 - MSc Master of Science
 - MSP Middle Schooling Project
- NACTE National Accreditation Council on Teacher Education
 - **NEP** National Education Policy
 - NGO nongovernmental organization
 - **NPST** National Professional Standards for Teachers
 - **OTC** Oriental Teaching Certificate
 - PBL project-based learning
 - **PC** Planning Commission
 - PCK Pedagogical Content Knowledge
 - **PD** professional development
 - PD Provincial Director (USAID Teacher Education Project)
- **PEACE** Provincial Education Assessment Center
 - PhD Doctorate of Philosophy
 - **PITE** Provincial Institute of Teacher Education
 - **PLCs** Professional Learning Communities
- Pre-STEP Pre-Service Teacher Education Programme, Pakistan
 - PRP Pakistan Reading Project
 - PST Primary School Teacher
 - PTC Primary Teacher Certificate
 - **QA** Quality Assurance
 - **REEC** Regional Education Extension Centre
 - **RSU** Reform Support Unit
 - **SAT** Standardized Achievement Test
 - **SECT** Senior Early Childhood Teacher
 - **SEEN** Sindh Elementary Education Network
 - **SEMIS** Sindh Education Management Information System
 - **SEP** Science Education Project
 - **SERP** Sindh Education Reform Programmes
 - SESP Sindh Education Sector Plan
 - SIP school improvement plan
 - **SOP** standard operating procedure
 - **SPEDP** Sindh Primary Education Development Project

SSST Senior Secondary School Teacher

SST Secondary School Teacher

STBB Sindh Text Book Board

STEDA Sindh Teacher Education Development Authority

STEP Strengthening Teacher Education

SWOC Strengths, Weaknesses, Opportunities, and Challenges

TE Teacher Education

TED Teacher Education Development

TEDDS Teacher Education Development Database System in Sindh

TEIs Teacher Education Institutes

TEO Tehsil Education Officer

TIG Teacher Inquiry Group

TLM teaching learning materials

TRC Teacher Resource Centre

TTI Teacher training institution

TTP Teacher Training Project

UC Union Council

UNESCO United National Educational Scientific and Cultural Organization

UNICEF United Nations Children's Fund

USAID United States Agency for International Development

WB World Bank

6. Functional Definition of Technical Terms

Accreditation

A process designed by STEDA for assessing and enhancing academic and educational quality of service providers in the field of teacher education through expert and peer review. STEDA accreditation informs the public that an institution has a capacity to meet provincial, professional, and institutional standards of teacher education quality.

Alternative assessment

A method to measure student educational attainment other than the typical multiple-choice test which may include portfolios, constructed response items and other performance measurement tools.

Cluster Hub School

The school that will be declared for managerial and academic support for rest of schools in a cluster under the School Clustering Policy 2016.

Continuous Professional Development

A programme that provides opportunities for all teachers and other individuals of Sindh Education and Literacy Department to increase their current level of knowledge and skills through participating in various professional development activities, coursework or other means in order to improve standard of education in Sindh.

Data-based decision making

Organizing, analysing and interpreting existing sources of information and other data before or during the implementation of CPD programme, to make decisions for increasing effectiveness of the CPD programmatic activities and improve efficiencies of its administrative activities in the Sindh.

Dispositions

The values, commitments, and professional ethics that influence behaviours toward students, teachers, colleagues, and communities and affect student learning, motivation, and development as well as the educator's own professional growth.

Guide Teacher

A Guide Teacher will be selected from the pool of master trainers within the *Tehsil* and she/he will be working as a teacher at CHS/CS under the School Clustering Policy 2016.

Initial Teacher Preparation Programmes

Programmes at the graduation or post-graduation levels that prepare candidates for the first degree to teach in a school. These programmes include four-year BEd programme, master's programmes , and other post-graduation and alternate route programmes that prepare individuals for their first degree in teaching.

Keeping in grade-levels in Sindh province, government schools have been classified as follows

Levels of schooling

- Primary: grades 1 to 5
- Middle: grades 1 to 8 (Elementary grades 1 to 8)
- Secondary: grades 1 to 10 (or grades 6 to 10)
- Higher Secondary. grades 1 to 12 (or grades 6 to 12)

Licensure

The official recognition by the STEDA that an individual has met certain qualifications specified by Sindh and is, therefore, approved to teach as a professional.

Pedagogical Content Knowledge

The interaction of the subject matter and effective teaching strategies to help students learn the subject matter, i.e. teachers' interpretations and transformations of subject-matter knowledge in the context of facilitating student learning. In other words PCK is a type of knowledge that is unique to teachers, and is based on the manner in which teachers relate their pedagogical knowledge (what they know about teaching) to their subject matter knowledge (what they know about what they teach).

Pedagogical Knowledge

The general concepts, theories, and research about effective teaching, regardless of content areas.

Performance-Based Accreditation System

A practice in accreditation that makes use of assessment information describing teacher's proficiencies or actions of PITE as evidence for determining whether professional standards are met. It contrasts with accreditation decisions based solely on course offerings, programme experiences, and other "inputs" as the evidence for judging attainment of professional standards.

Professional Community

Teachers in Sindh Educating and Literacy Department , faculty in PITE, BOC, and other TEIs, protective teachers, and others involved in professional education.

Professional Development

All those opportunities provided by Sindh Education and Literacy Department for teachers and its other staff for enhancing their professional competency and to develop new knowledge and skills through activities under CPD programme and other means.

Satellite schools All those schools that will be fall under a cluster for a Cluster Hub School.

Scholarship

Systematic inquiry into the areas related to teaching, learning, and the education of teachers and other school professionals. Scholarship includes traditional research and publication as well as the rigorous and systematic study of pedagogy and the application of current research findings in new settings. Scholarship further presupposes submission of one's work for professional review and evaluation.

School cluster

A 'school cluster' is defined as a group of schools that are geographically close and accessible to each other, within a radius of 15-20 kms (it would vary depending on each case and as further elaborated in the School Clustering Policy 2016.

Sindh Elementary **Education**

A portal will be developed to strengthen CPD activities for teachers in Sindh through providing online resources and discussion forums. It will help in offering high quality, often free, online professional development delivered by

Network

world-leading experts. Furthermore, problems and resources linked to the primary and elementary school curriculum, with support for teachers, will be placed on it. The portal will also provide information about special CPD sessions offered by the School Education Department, Government of Sind.

Standardized Achievement Test

Government of Sindh commissioned large scale study to assess the achievement of students completing their Grade V and VIII in all government schools of the Sindh province. For this purpose, a test is devised entitled as SAT (Standardized Achievement Test) to assess students' achievement in 3 subjects including Language (Sindhi/Urdu/English), Math and Science

Subject Coordinator

An elementary/primary school teacher, who will be selected by the Guide Teacher, keeping in view her/his qualification and performance during the training. The person will work as mentor for her/his other colleagues in nearby 2 to 3 schools, and she/he her/himself will be a teacher in any of these 2 to 3 schools. The person will either work for Mathematics and Science Subjects, or for Languages- English and Sindhi/Urdu