

The CEDS common data vocabulary supports the collection and use of information about virtual and blended learning. The data element **Virtual Indicator**, introduced in version 3 of CEDS, supports a range of virtual learning – related use cases. The Virtual Indicator element may be related to a Course Section, a K12 School, or a Postsecondary Institution.

For example, the Virtual Indicator may be used with other data elements to determine

- the number of students enrolled in a virtual school full time;
- the number of students enrolled in virtual courses part time;
- completion rates of students in physical vs. virtual settings;
- information about organizations offering virtual courses.

These are often used in combination with other elements. For example, in K12, "Responsible District Type," "Responsible School Type," and "Responsible Organization Type" may be used with an enrollment record to indicate which physical or virtual organization provides the setting for the delivery of educational services, which organization is responsible for funding the service, and which organization is accountable for student outcomes.

Blended learning is a formal education program in which a student learns (1) at least in part, through online learning, with some element of student control over time, place, path, and/or pace; (2) at least in part, in a supervised brick-and-mortar location away from home. (See <a href="http://www.christenseninstitute.org/blended-learning-definitions-and-models">http://www.christenseninstitute.org/blended-learning-definitions-and-models</a>.) The CEDS elements **Blended Learning Model Type** and **Course Section Instructional Delivery Mode** specifically address blended learning. **Course Interaction Mode** defines an important consideration for virtual learning, but also may be in other modes of learning.

## Scope

CEDS includes the following virtual and blended elements:

Element Name	Definition	Option Set
Virtual Indicator	Indicates that a school, institution, program, or class/section focuses primarily on instruction in which students and teachers are separated by time and/or location and interact through the use of computers and/or telecommunications technologies.	Yes No
Professional Development Delivery Method (EL, K12)	The method by which a professional development session is delivered.	Onsite Virtual classroom Off-site classroom Conference

Technical Assistance Delivery Type  Course Interaction Mode (K12)  Blended Learning Model Type (K12)	The method of delivery of technical assistance received/provided.  The primary type of interaction, synchronous or asynchronous, defined for the course.  A type of formal education program in which a student learns at least in part through online learning, with some element of student control over time, place, path, and/or pace; in which the student learns at least in part in a supervised brick-and-mortar location away from home; and in which the modalities along each student's learning path within a course or subject are connected to provide	Onsite Virtual classroom Off-site classroom Conference Asynchronous Synchronous Rotation model Flex model A La Carte model Enriched Virtual model
Course Section Instructional Delivery Mode (K12, CTE)	an integrated learning experience.  The primary setting or medium of delivery for the course.	Broadcast Correspondence Early College Interactive Audio/Video Online Independent Study Face to Face Blended Learning
Distance Education Course Enrollment (Postsecondary)	An individual's enrollment in a course or courses in which the instructional content is delivered exclusively via distance education. Distance education is education that uses one or more technologies to deliver instruction to students who are separated from the instructor and to support regular and substantive interaction between the students and the instructor synchronously or asynchronously. Technologies used for instruction may include the Internet; one-way and two-way transmissions through open broadcasts, closed circuit, cable, microwave, broadband lines, fiber optics, satellite or wireless communication devices; audio conferencing; and video cassette, DVDs, and CD-ROMs, if the cassette, DVDs, and CD-ROMs are used in a course in conjunction with the technologies listed above.	Enrolled Exclusively Enrolled In Some Not Enrolled
Distance Education Program Enrollment Indicator (Postsecondary)	An individual's enrollment in a program for which all the required coursework for program completion is able to be completed via distance education courses. Distance education is education that uses one or more technologies to deliver instruction to individuals who are separated from the instructor and to support regular and substantive interaction between the individuals and the instructor synchronously or asynchronously.	Yes No

<sup>&</sup>lt;sup>1</sup> Option definitions adapted from <a href="http://www.christenseninstitute.org/blended-learning-model-definitions/">http://www.christenseninstitute.org/blended-learning-model-definitions/</a>.

Course Instruction Method (Postsecondary)	The primary method of instruction used for the course.	Lecture Laboratory Seminar IndependentStudy PrivateStudy PracticeTeaching Internship Practicum ApprenticeshipExternship AppliedInstruction Residency ClinicalRotationInstruction SelfPaced FieldStudy InternetInstruction InteractiveVideo Videotape Television OtherDistanceLearning Audiotape ComputerBasedInstruction CompressedVideo
		Correspondence CooperativeEducation WorkStudy
Adult Education Special Program Type (Adult Education)	The type, by location or delivery mode, of adult education instruction program in which an adult participates.	WorkStudy Correctional education program in facility or community Family Literacy Workplace Literacy Program for the Homeless Co-enrollment in adult education and postsecondary education Distance Education
Proxy Contact Hours (Adult Education)	The number of instructional hours completed by an adult enrolled in a distance learning program.	None

## **CONNECTions**

CEDS CONNECT is an online resource mapping CEDS data elements to specific uses or questions. The free tool allows a registered user to create a "CONNECTion" that defines what data elements and business rules apply to certain questions, such as "In what schools are students enrolled in an 'À La Carte model' of blended learning and in what subject areas?" The following CEDS Connections are available:

Connection	URL
Blended Learning Elements in CEDS	https://ceds.ed.gov/connectManageCase.aspx?UseCaseId=136

(Other CONNECTions may be developed from time to time. Please visit <a href="http://ceds.ed.gov">http://ceds.ed.gov</a> for more information.)