Glossary of Terms

> 🔍 Find something...

Additive Grading

a grading technique commonly used in gamified classrooms where every student starts with zero points (or no grade) and earns points and grades as they complete assignments throughout the school year or grading period

Algorithm

a set of steps that are used to complete a task

Algorithmic Thinking

breaking problems down into smaller workable parts

Authenticity

materials are produced by real speakers or writers for a real audience and for a real purpose; the learning tasks are designed to engage students in genuine communications with real audience; emphasizes an authentic context or discourse, not just a "native" speaker

Badges

a digital artifact or image that is awarded to individual students upon the completion of an assignment or task or in recognition for the demonstration of specific skills or knowledge; another way, besides grading, to recognize student achievement

Behaviorism

a learning theory popularized in the mid-20th century, it treats learning as a response to stimulus and it conditions students to properly react to stimuli; the brain's processes are not considered and viewed as a "black box"

Bias

how people's different experiences, life views, and ideologies shape their perceptions and understanding of information

Block-based Coding

coding with a programming language where the instructions are represented in blocks

Blog

an online tool, similar to a journal, where a user can write entries (called posts)

Blog Post

a single blog entry on a specific topic

Blogging Platform

an online site like Weebly or EduBlogs where blogs are hosted

Child Pornography

any pornographic or illicit depiction of a child; viewing, sharing, or owning child pornography is a felony in the United States

Coding

a language that a computer can use to complete a task or a set of instructions

Cognitivism

a learning theory that focuses on brain functions and how information is processed, stored, retrieved, and applied

Collaboration

engaging students in working and communicating with one another to accomplish a learning task together (e.g., students learn to communicate effectively for group work and assume shared responsibility)

Communicative Competence

language learners' ability to understand and use language effectively to communicate in authentic learning environments that allow them to connect what they learn to real-life situations

Compliance

legal, ethical, and institutional requirements of technology use (in contrast to their pragmatic use)

Computational Thinking

a problem solving process; typically broken down into decomposition, pattern recognition, abstraction, and algorithm design

Computer Language

structured commands written for a computer to process; some of the most common include JavaScript, Python, Structured Query Language (SQL), C, C++

Connectivism

a learning theory that believes that learning need not be isolated to the mind, but becoming a learned and capable citizen in a digital society requires learners to become connected with one another in such a way that they can make use of the network as an extension of their own mind and body

Constructionism

a learning theory in which students construct artifacts in the outside world that support and reflect their internal construction of knowledge

Constructivism

a learning theory that considers individual and social factors by holding that learning is constructed by learners on top of previous experience, attitudes, and beliefs

Copyleft

an alternative to copyright that allows one's work to be copied, shared, or remixed (e.g., Creative Commons)

Copyright

legal protections for authors of creative works (e.g., books, movies, lesson plans) that prevent them from being used by others without permission

Cyberbullying

a form of bullying that uses internet and other technologies as a means for perpetrating bullying behaviors

Data Persistence

the ongoing storage and availability of data via web platforms (e.g., old social media posts)

Debugging

the process of testing, finding, and solving errors in computer programs

Differentiation

tailoring instruction to address students' individual needs

Digital Citizenship

the skills and knowledge students need to fully participate in society via online tools, including safe and respectful use

Digital Divide

a difference in access or participation via digital technologies experienced by two or more individuals or groups of people

Digital Equity

a condition in which all individuals and communities have the capacity and resources needed for full participation in a 21st-century education, economy, and society

Digital Footprint

the electronic tracks that are left online as users create profiles, share posts, follow others, like content, etc.

Domain

the primary identifier of a website that is made up of a website name, such as facebook, google, or twitter, followed by a domain type (or top-level domain), such as .com, .edu, or .org

English Language Learners (ELL)

students who often come from families where languages other than English are spoken and whose English proficiency may be defined as limited at least at some point of formal schooling; often required to fulfill certain language requirements, such as language assessments or specialized language courses

Facility

the ease at which a new technology can be learned, implemented, or managed at the teacher- or student-level

Fair Use

the limited ability to use copyrighted works without permission as determined by four factors (Nature of Use, Type of Work, Amount Used, and Commercial Impact)

First-Level Digital Divide

when two groups experience uneven opportunities to access information communication technologies

Fixed Mindset

a belief that individual qualities, such as intelligence or talent, are fixed (unchanging) traits

Grit

a non-cognitive trait comprised of passion and motivation to achieve a particular objective

Growth Mindset

a belief that individual qualities, such as intelligence or talent, can be developed through dedication and hard work

Hacking

when a person or program bypasses or tricks normal security procedures in order to gain access to a site or service

Independent Learning

a learning scenario in which the learner takes charge of their own learning (also self-directed learning)

Information Communication Technology (ICT)

an extensional term that describes any product that will store, retrieve, manipulate, transmit, or receive information electronically in a digital form and includes communication devices such as the radio, television, cell phones, personal computers, email, social media, and Internet

Information Literacy

the ability to accurately understand and interpret information that is presented (e.g., recognizing accuracy, bias)

Institutionalization

infrastructural compatibility, cost, lifespan, and management scale of new technologies

Leaderboard

the student roster displayed in order based on the number of points awarded; can include student names or be anonymous in order to maintain privacy

Learner Autonomy

the ability to take charge of and responsibility for one's own learning in order to pursue topics that are relevant and interesting to the learner

Learner Empowerment

raising learners' awareness of the control they can have over their own learning process, which often goes hand in hand with the concept of learner autonomy (e.g., when language learners are empowered, they are given the power and ownership of their own learning and are allowed to negotiate identities in the learning process)

Learning Center

a space set in the classroom that allows students to engage in independent and self-directed learning activities

Levels

the grading scheme in a gamified class is made up of levels that students move through as they earn points in the class; each level has a minimum number of points required in order to attain that level; letter grades can be assigned to different levels (i.e. the top level could be considered an A+)

Locks

when a specific requirement must be met in order to access a particular assignment, task, project or level; for instance, Assignment 2 might be locked until a student earns at least 80% on Assignment 1

Malware

malicious software or any software or app that is designed to steal your personal information or cause your electronic devices to behave improperly

Media Literacy

the ability to access, evaluate, and create media in a variety of formats

Mindset

a self-perception that people hold about themselves, such as believing you are intelligent

Moral Turpitude

a typically not-well-defined clause in teacher contracts that allows employers to hold teachers accountable for the morality of their actions

Multiliteracies

emphasize that language use is context-specific and multimodal; values the differences between different communication modes

Open

in the context of openly licensed materials or open educational resources (OER), this means gratis and libre; gratis means that content and resources are provided at no cost, while libre means that people are free to do what they want with these resources

Open Educational Resources (OER)

materials for teaching, learning, and research that people have free access with no cost and can legally retain, reuse, revise, remix, redistribute them

Open Licenses

an license that allows users to freely use a resource without seeking permission (e.g., public domain, Creative Commons)

Openness

the level of license on educational resources which indicates different conditions, restrictions, or permissions users need to follow when they use or share the educational resources

Ownership

like learner autonomy, this concept hands more learning responsibility to students; moreover, it emphasizes on the importance of making connections between learners and the language they are learning at different levels as a way to strengthen the bond; promoting ownership is considered as a strategy to enhance learner autonomy

Pair-programming

two students sit at one computer, one is the "navigator" and one is the "driver"

Personal Learning Environment (PLE)

an environment that educators create by exposing themselves to information that is always updated and of practical value to their work (e.g., blogs, RSS feeds, news sites, social media feeds, podcasts, and video channels)

Phishing

an attempt to maliciously exploit sensitive personal information online; a play on the word "fishing," because it implies the use of bait to trap a victim

PICRAT

a technology integration model that holds that all technology uses either exemplify a Passive, Interactive, or Creative (PIC) relationship between student and technology as well as have a Replacement, Amplifying, or Transformative (RAT) effect on pedagogy

Professional Learning Network (PLN)

networks that professionals build around themselves via social media to improve their practice, share resources, and improve morale

Project-Based Learning

the use of real-world scenarios, challenges, and problems, to help students gain useful knowledge and skills that increase during their designated project periods

Proof

evidence-based efficiency or efficacy of a technology to help improve student learning

Pseudocode

informal or simplified programming language that can be used to represent algorithms outside the computing environment

Public Domain

in the US, a technical term referring to works that are not subject to copyright protection, such as very old works

RAT

a technology integration model that holds that technology use either Replaces, Amplifies, or Transforms (RAT) pedagogical practices (Hughes, Thomas, & Scharber, 2006)

Royalty Free

a variation of copyright that allows materials to be used in some limited manner (e.g., print an image up to ten times) without paying a fee

SAMR

a technology integration model that holds that technology use in the classroom either takes the form of Substitution, Augmentation, Modification, or Redefinition (SAMR)

Second-Level Digital Divide

when two groups have similar access to the information communication technologies, but gain different levels of benefit from them as a result of literacies, training, technical support, or other factors

STEAM

Science, technology, engineering, arts, and mathematics

Technology Integration

the meaningful implementation of technology in educational settings to achieve learning goals

TPACK

a technology integration model that illustrates the complex interplay between Technological Knowledge, Pedagogical Knowledge, and Content Knowledge

Unplugged

a coding lesson that does not require a computer