Instructional Materials Technology Information Template

Instructional Materials Technology Information

Since EdReports released its first reviews five years ago, the materials landscape has changed dramatically, especially in the area of technology. District questions have evolved from ensuring materials could be accessed on older browsers and versions of operating systems to detailed questions about interoperability, compatibility, security, support, and digital design. These questions have become even more important during the pandemic as districts assess what instructional materials may work best in their communities not just in-person, but also remotely and in hybrid settings. Access to high quality instructional materials by all students is more important than ever, and technology plays an essential role in that access. To help provide technology information for materials that meet alignment criteria in Gateways 1 and 2, EdReports is requesting publishers answer the following questions to help consumers better understand the digital design and capabilities of their instructional materials.

- Section 1 provides broader questions most frequently asked of EdReports about the design of materials. These questions are meant to provide higher level, summary information.

- Section 2 provides more fine-grained details on aspects of design and functionality.

EdReports is seeking the most accurate, descriptive information about curricular products. We are not evaluating quality or desirability, but documenting features in materials to empower local schools and districts with information to select materials that will work best for them given their technological capabilities and instructional vision.

Section 1: Usability Snapshot
Section 2: Technology Details
- Design
- System Access
- Technical Support
- Compatibility
- Accessibility
- Additional Technology Specifications

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Section 1: Usability Snapshot

This section includes questions on digital design and support that allows users quick access to essential information. Please do not exceed a 150 word limit per question. You may use or remove prompt text in providing additional details. Words in the detail prompt text will not count toward the word limit.

* Note:
"Yes with core product" below should be used to indicate functionality in the materials purchased that are available without LMS integration.
"Yes with dependencies" below refers to functionality present or accessible only through working in a separate LMS, by utilizing other software as a plug-in, or linking externally to sites outside the materials.

Questions	Check Only One				Details
	Yes with core product	**Yes** with dependencies	**No**	**Under Development**	
Are the materials designed so that students are able to access and complete work online?					If yes, ● Note if this is within the native materials system or if it requires LMS integration or other integrated software. ● Does online work require a 1:1 device ratio? ● Does each student need a continuous reliable internet connection to use all materials features?
In what ways do the materials support learning in hybrid settings (both in-person and remote learning) concurrently?					
Are tasks, activities, and lessons able to be printed either for in-class use or for use in at-home learning?					

Is there instruction so students can work independently (or with an adult at home)?					If yes, • Describe the instruction (written, videos, animations, etc.). • Describe the work (practice, new lessons, assessments). • Detail the level of adult support or involvement necessary.
Does the technology facilitate a teacher's ability to differentiate lessons, tasks, or other content for students?					If yes, • Does the technology itself differentiate based on student responses? • Does it provide feedback to students directly as they complete assignments? • Does the technology provide recommendations to the teacher? • What control does the teacher have over the content? (e.g., Can changes be made to a question's wording? Can teachers choose specific reading selections?)
Are there tutorials, videos, or other integrated supports in the materials to help educators to understand and/or utilize the materials?					
Are there tutorials, videos, or other integrated supports in the materials to help parents/guardians to understand and/or utilize the materials?					If yes, • Are parent supports available in multiple languages? Specify which languages.
Are all of the following audiences provided access to the product as part of the core purchase? • parents/guardians					If yes, • Is activity within the system tracked and who can see this data? • What can be viewed? Student work? Grades? Unit/lesson/assignments/readings?

• Educators (Teachers, Administrators, etc.) • Students					

Are the materials designed to integrate with a Learning Management System (LMS)?					If yes,
					  • Are the full materials accessible outside of an LMS?
					  • Can they be modified once they are imported or are they static?

Does all content conform to the National Instructional Materials Accessibility Standard?					
Is technical support during day-to-day use primarily the responsibility for the client or the publisher?					

Section 2: Technology Checklist

The following checklists are designed to give more detailed information about digital design and technical capabilities in key areas of instructional materials to support state and local decision making. This list reflects details commonly requested by those making purchasing decisions at the state or local level. You may use or remove prompt text in providing additional details.

Design

Design questions address whether the materials are designed to be used digitally in an in-person environment, remote learning environment, or both. Digital design can vary, often ranging from the ability to access files that are identical to print materials online to doing tasks and assessments as part of the program. The ability to take advantage of design functionality may depend on answers to questions in other sections of the checklist such as internet capabilities, number and type of devices, etc.

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Questions	Check Only One				Details
	Yes with core product	**Yes** with dependencies	**No**	Under Development	
Are the materials designed to be used with both digital and print components? Are there print options available for student-facing materials that could be utilized in a blended digital approach? Is the print content identical, similar, or comparable to the digital?					If yes, • What are the print options? (check all that apply) _____ Purchase hard-copy books/workbooks _____ Photo copies available for purchase _____ Users can print at home • Add any additional details.
Is the digital design of the materials intended to replicate a textbook experience?					If yes, • Specify format (e-book, PDFs).
Are digital teacher guides available for the materials?					If yes, • How do teachers access digital teacher guides? • Are guides available to parents/guardians at home? • Do teacher planning materials connect to student-facing lessons? • Are there any additional costs for these resources?

Do the materials contain videos/animations/simulations for student learning?					If yes, ● Specify frequency (every lesson, some lessons, only teacher support, both teacher and student). ● Are these native to the materials or accessed by links that lead to other sources not maintained by the publisher?
Is any or all online content dependent on links that are not maintained by the publisher?					If yes, ● Detail permissions the district may need to set to ensure access to this content (age restriction bypass, specific URL permissions etc.).
Do the materials include opportunities for online collaboration among students?					If yes, ● Describe these opportunities.
Do the materials include built in features for student-to-teacher interaction?					If yes, ● Describe these opportunities.
Is a 1:1 device ratio required?					If no, ● Include recommended device ratio.
Are the assessments contained within the materials able to be securely completed by students online?					If yes, ● Is this true of all assessments? ● Are assessments editable by teachers?
Is data available about user sessions (e.g., timestamps, content being viewed, callbacks fired, etc...)?					If yes, ● How is this gathered and reported? ● Who has access to this data?
Are there online professional learning supports to help teachers utilize the materials?					If yes, ● Describe these supports and any associated additional costs.
Are there parent/guardian resources available for school systems to utilize:					If yes, ● Please include details such as if there are: - Sample schedules - Instruction guides

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					- Classroom management suggestions - Feedback options
• For when there is in-person instruction? • For when there is hybrid instruction? • For creating continued learning plans for distance learning schedules?					

Learning Management Systems	Blackboard	Canvas	Eduphoria	Google Classroom	ItsLearning	Moodle	Schoology	Other: Please list below
Are the materials configured to work with one or more learning management systems? Check all that apply.								
If the materials integrate with any of the LMS above, include information here about any additional costs and which version of your materials and the LMS was tested.								

System Access

System access questions address how users access the digital materials and what kind of logins/passwords are accepted/supported/required.

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te LMS, by utilizing other software as a plug-in, or linking externally to sites outside the materials.

Questions	Check Only One				Details
	Yes	Yes with dependencies	No	Under Development	

	with core product				
Is single sign-on supported?					If yes, ● List which single sign-on methods/tools are supported (e.g., Clever, ADFS, Google, etc…).
Can the platform manage staff assigned to multiple schools with a single sign-on?					
Can co-teachers be assigned to multiple classes?					If yes, ● Describe this process. ● Is it managed at the teacher, school administrator, or network level?
Can students who move between teachers or schools using the same materials be re-assigned without losing their work/progress?					
Can the platform provide user accounts for staff members (principals and other admin) who are not assigned students?					If yes, ● What roles can be assigned within the system and how are permissions/access controlled? ● Specify if this is part of a standard contract or would require additional purchase.
Can passwords be reset without assistance from trained IT staff?					If yes, ● Describe if the customer is able to enable/disable this feature. ● Detail for whom (students, teachers, all staff).
When working offline, does the product automatically sync when a connection is re-established?					

Technical Support

Technical Support questions are designed to help users understand what assistance to expect. These details are important to consider alongside local capacity for devices, networks, and use. Considering what level of independence users will have alongside these criteria can help schools and districts reflect on their needs for support.

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Technical Support	Check Only One				Details
	Yes with core product	Yes with dependencies	No	Under Development	
Is technical support provided to districts during initial set-up and deployment?					If yes, ● Specify type of support provided.
Is technical support provided during the duration of the contract?					If yes, ● Specify the type of support provided and the audience. ● Include where users get tech support. ● Can students access on-demand technical assistance? Parents? Teachers? Is this through a ticketing system or live chat? ● What hours is help available? ● Is there a response time guarantee?
If utilizing a free or trial version, is technical support provided?					
Are there self-service supports for troubleshooting?					If yes, ● Specify the type/form of support provided.
Does technical support include planning for emergency access and district support?					

Compatibility

Compatibility questions address technical compatibility specifications. It is designed to help users understand how the materials will look and operate on various devices. These details are important to consider alongside local capacity for devices, networks, and use. Understanding what devices function best can help determine users' needs for district device or technical support.

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Questions	Check Only One				Details
	Yes with core product	**LMS Dependent**	**No**	**Under Development**	
Does the product have a native mobile application?					
Is the product browser-based?					
Does the product use responsive design for rendering on smartphones?					
Does the product use responsive design for rendering on tablet devices?					
Does the product use responsive design for rendering on laptop devices?					
Does the product use responsive design for rendering on desktop devices?					
Are all users (students/teachers/staff/admin/parents) permitted to use the product on more than one				If yes,	

device (e.g. computer at school and a laptop at home or a smartphone and a laptop)?					• Are additional software downloads or licenses necessary?

Device Type	Mark box if device is compatible	Oldest operating system/version supported	Newest operating system/version supported	Details Indicate if the materials are designed for a specific device type or if they are generally compatible.
Windows	☐			
Linux	☐			
Windows Tablet	☐			
Apple Laptop/Desktop	☐			
iPhone	☐			If supported, provide details about any differences between devices.
iPad	☐			
Android Phone	☐			If supported, provide details about any differences between devices.
Android Tablet	☐			
Chromebook/Chrome OS	☐			
Amazon Fire OS	☐			
Other E-Reader	☐			If supported, specify which e-readers are compatible.
Interactive Whiteboard	☐			

Browser	Operating System				
	Apple	Windows	Linux	Chrome OS	N/A

	Check if browser is compatible	Oldest version supported	Newest version supported	Oldest version supported	Newest version supported			
Chrome	☐							
Firefox	☐							
Safari	☐							
Edge (formerly Internet Explorer)	☐							
Internet Explorer	☐							
Other:____	☐							
Additional Notes:								

Accessibility

Curricula with digital capabilities integrate accessible supports in a variety of ways. Accessibility questions pertain specifically to diverse learners who may need specific supports to be able to successfully interact with materials.

Questions	Check Only One				Details
	Yes with core product	Yes with dependencies	No	Under Development	
Screen Readers					
Screen Magnification Software					

Text Readers				
Adjustable Print Size				
Speech Input Software				
Header Point Devices				
Motion/Eye Tracking Devices				
Single Switch Entry Devices				
Braille Readers/ Display Devices				
Closed Captioning				
Alternative Input Devices				
High Color Contrast Display Options				
Translation of Text to Other Languages				If yes, • Specify available languages
Bilingual Dictionaries available for students				
Are there required accessories (headsets, speakers)?				If yes, • Specify if they are provided with the materials or must be acquired separately.
Multiple Playback of audio/video				
Can students adjust the speed of audio/video playback?				

Are these accessibility supports able to be turned on/off?				If yes, ● Specify which supports and who has access to turn them on/off.
Does all browser-based technology satisfy the Web Content Accessibility Guidelines or VPAT?				If yes, ● Provide reports from the software or organization used to test the product.

Additional Technology Specifications

Data Security and Privacy

Data Security and Privacy questions address how student data storage, disposal, and adherence to privacy laws are addressed. If applicable, privacy reports and/or certificates can be found next to the respective indicator.

Questions	Check Only One			Details
	Yes	No	Under Development	

Data Security: Are data elements encrypted at rest, i.e. in a database or file system?				If yes,
				   ● Specify which data elements are encrypted.
				   ● Describe the encryption method used.
				   ● Identify data that are persisted without encryption.

Data Security: Do the materials refer students to video, content, and other online sources that are not native to the materials?				If yes, ● Is it a closed system? If no, how does it direct out of the environment?
Data Security: Does the end-user licensing agreement allow customers to scrape data from the product?				
Privacy: Is personally-identifying student data provided to, generated by, or stored in any systems used by the product?				If yes, ● List all data elements that customers are required to provide.

Feature/Requirement/Specification				Details
				• List all data elements that are optional for customers to provide. • List all data elements created by the product. • List all data elements stored in any of the product's systems.
Privacy: Does the product/vendor make their student privacy policy publicly available?				If yes, • Provide a link to the policy in the details.
Privacy: Does the product conform with FERPA regulations (e.g., allows districts to maintain direct control of the student record, implements permissions to prevent unnecessary disclosures, etc.)?				
Privacy: Has a third-party evaluated the product for FERPA compliance?				If yes, • Identify the third party who conducted the evaluation and provide a link to the report.
Privacy: Does the product allow registration or data collection from children under the age of 13?				If yes, • Provide a link to the COPPA Safe Harbor certificate.

Installation

Feature/Requirement/Specification	Check Only One			Details
	Yes	**No**	**Under Development**	
Is the product downloaded to individual devices: one-time internet connection required?				
Is the product installed on individual computers (from CD-ROM/DVD, flash drive, etc.): no internet connection required?				If yes, • Estimate time per device required for setup, indicate if support is provided, and if local IT staff is needed.

Is the product installed on LAN/WAN (school or district server): no internet connection required for teachers/students after installation?				
Required server configuration. Do network admins need to ensure a specific set of domains are white listed to allow the internet traffic to those endpoints?				If yes, • List requirements and specify if set-up support is provided.
Does the product support deployment through Mobile Device Management (MDM) systems?				If yes, • Identify which systems are compatible.
Does the product provide a detailed schedule of updates that minimizes access interruption?				
Does the login authentication use district protocols to establish unique and memorable usernames and passwords?				If yes, • Indicate if district staff/student unique IDs are used. If other, • Specify the protocols.
Is there an option for concurrent user licensing?				

Standards Compliance/Certification	Check all that apply	Details
SIF		If checked, include where customers can verify this information.
CEDS		If checked, include where customers can verify this information.
EDUPUB		If checked, include where customers can verify this information.
Ed-Fi (SIS/ODS)		If checked, include where customers can verify this information.
Ed-Fi (Assessments)		If checked, include where customers can verify this information.

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MS Global (Competencies and Academic Standards Exchange)		If checked, include where customers can verify this information.
IMS Global (Comprehensive Learner Record)		If checked, include where customers can verify this information.
IMS Global (Open Badges)		If checked, include where customers can verify this information.
IMS Global (One Roster)		If checked, include where customers can verify this information.
IMS Global (Caliper Analytics)		If checked, include where customers can verify this information.
IMS Global (Question and Test Interoperability (QTI))		If checked, include where customers can verify this information.
IMS Global (Learning Tools Interoperability (LTI))		If checked, include where customers can verify this information.
IMS Global (LTI Advantage)		If checked, include where customers can verify this information.
IMS Global (Common Cartridge)		If checked, include where customers can verify this information.
IMS Global (Lite Common Cartridge)		If checked, include where customers can verify this information.
IMS Global (Open Video)		If checked, include where customers can verify this information.
Other:		If checked, list and include where customers can verify this information.

Implementation and Scalability	Yes/No or Value
What is the average page load time?	
What is the required bandwidth per user?	
Are results of stress tests provided to customers?	If yes, ● Provide either a link to the stress testing report or a summary of the results.
Is a disaster recovery plan for data provided to customers?	

Are customers provided with a standardized implementation plan to ensure a successful rollout?	
Does the service level agreement include uptime guarantees of at least 95% excluding planned maintenance/down-times?	
Does the product require a VPN for off site access?	

Key Terms to Better Understand Remote Learning and Education Technology

Across the country, schools have rapidly transitioned to providing remote services in response to the COVID-19 crisis. For many educators and parents, the terms used to describe remote learning and the accompanying technology is brand new and often confusing.

The term "digital" is a common word being used when discussing remote learning. It is important to define "digital" as it can apply to different types of materials. For example, materials could be lessons available for free online, commercial supplemental programs, or year-long comprehensive core materials. For year-long comprehensive materials, the term is used to encompass a broad range of products ranging from online PDFs or ebook versions of textbooks to materials designed for full-time remote teaching and learning. For this glossary, "digital" is used in its broadest definition, referring to any materials accessed through technology as opposed to print.

As part of EdReports' efforts to provide more information about the digital design and components of standards-aligned instructional materials, we have put together a list of key terms that are frequently associated with remote learning.

1-to-1 technology - One device per student with the goal of making learning more individualized and to extend academics beyond the four-walled classroom.

Adaptive Software - Adaptive software is any software or program that builds a model of the preferences, goals, and knowledge of each individual student and uses that model throughout the interaction with the student in order to adapt to that student's assessed needs.

Accessibility - A person with a disability is provided an equal opportunity to acquire information, receive a service, and participate in a learning experience with ease of use and independence. Accessibility must meet the Americans with

Disabilities Act (ADA) standards which includes [Web Content Accessibility Guidelines (WCAG)](#) and comply with Individuals with Disabilities Education Act (IDEA) and Section 504 of the Rehabilitation Act.

Asynchronous Learning - Learning that occurs in elapsed time between two or more people. Examples include email, online discussion forums, message boards, blogs, podcasts, etc.

Blended / Hybrid Learning - Situations in which a student learns at least in part at a supervised brick-and-mortar location away from home and at least in part through online delivery with some element of student control over time, place, path, and/or pace.

Browser / Web-Based - Computer tools and applications which run on a web browser via the internet without accessing the operating system of any individual computer. These applications are accessed through web pages.

Differentiated Instruction - Adjusting and adapting instructional methodology, programs, and materials to address individual students' learning needs.

Learning Management System (LMS) - Technology platform through which students access online courses or digital instructional materials. An LMS generally includes software for creating and editing course content, communication tools, assessment tools, and other features for managing the course.

Mobile Application - A mobile app is a software application developed specifically for use on small, wireless computing devices, such as smartphones and tablets, rather than desktop or laptop computers.

Open Education Resources (OER) - Any type of educational materials that are in the public domain or introduced with an open license (free for public use). The materials can be full year scoped and sequenced or individual lessons or units. Learn more about OER materials by visiting [Creative Commons](#).

Remote Learning - General term for any type of educational activity in which the participants are at a distance from each other—in other words, are separated in space. They may or may not be separated in time (asynchronous vs. synchronous).

Responsive Design - An approach to website design that automatically scales webpage content and elements to match the screen size on which it is viewed. It keeps images from being larger than the screen width, and prevents visitors on mobile devices from needing to do extra work to read the content.

Single Sign-On (SSO) - A session and user authentication service that permits a user to use one set of login credentials—for example, a name and password—to access multiple applications. SSO can be used to ease the management of various usernames and passwords.

Syncing - Process of updating apps and software to or between specific devices.

Synchronous Learning - Learning in which participants interact at the same time.

Virtual Private Network (VPN) - A VPN is a service that allows you to connect to the internet via an encrypted tunnel to ensure your online privacy and protect your sensitive data. VPNs are commonly used to secure connections to public Wi-FI hotspots, hide IP addresses, and make your browsing private.

More information can be found at:

- The Education Technology Dictionary - *Ed Shelf*
- EdTech Glossary - *Common Sense Media*
- Key Terms Regarding Online Learning and Education Technology: A Resource for Educators and Parents During the COVID-19 Disruption - *National Center for Learning Disabilities*
- Pandemic Planning for Distance Learning: Scenarios and Considerations for PreK–12 Education Leaders - *New America*