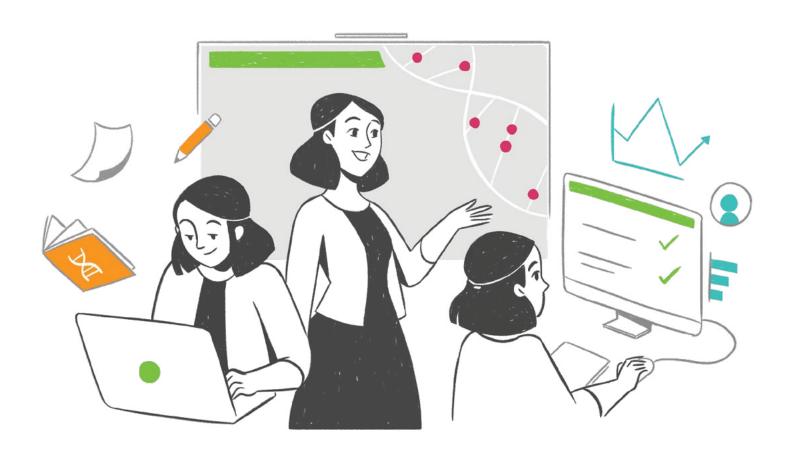


The essential guide to supercharging your science teaching with **Stile** 



# **Foreword**

Stile is a purpose-built teaching tool, designed to provide you with everything you need to deliver brilliant, engaging science lessons. No longer do you need to spend hours making your own resources! Our team of science teachers is constantly creating and updating lessons with up-to-date information and the latest science news from around the globe. Stile's curriculum-aligned lessons are ready to teach straight out of the box, with built-in customization and editing tools that let you tailor them to your specific needs. Make as few or as many changes as you like; it's all about teaching in your style and doing what works for your students.

Once you're in the classroom, Stile is your ultimate sidekick, putting tools that support student collaboration and class discussion at your fingertips. Our videos and simulations are designed to complement direct instruction and help you do what you do best: teach. Use Stile's collaborative tools to get students working together to answer questions, solve problems, and engineer solutions. Instant analytics let you recognize students' needs right away so you can respond appropriately.

With Stile X, you can offer support and extension for students in class or give them the tools to review and master knowledge independently. The scaffolded note-taking and study activities support students with strategies to be the best learners they can be, helping prepare them for success in high school science and beyond.

We wish you all the best on your Stile journey, and don't forget, you're welcome to discuss Stile teaching ideas with us any time. We're a bunch of science teachers based in Melbourne, Portland, and Los Angeles. We have team members across the world, and we love chatting with fellow educators about awesome science education.

Call us on +1 323 301 7470

Email us at community@stileeducation.com

We're located at 444 South Flower St, Suite 1300, Los Angeles, CA 90071

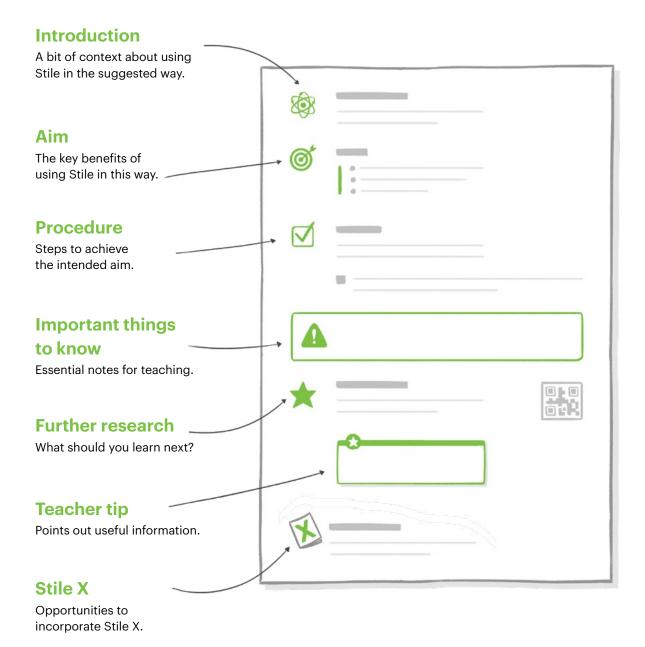
From the Stile team

# **Contents**

How to use this guide	4
Getting Stile set up for your first class	5
Getting started checklist	11
Stile in the classroom	12
Preparing to teach	13
Teaching with Stile	17
Analyzing student work	23
Running a scientific investigation	29
Conducting formative assessment	32
Conducting summative assessment	36
Tracking student performance over time	40
Student activity at a glance	43
Setting Stile for homework	44
Hybrid learning	47
Stile Professional Learning	50
Stile Concierge	51
Extra Notes	52

# How to use this guide

We love a reliable, repeatable experiment. That's why we've written these articles in the same tried and tested format. Here's what each section means:



# Getting Stile set up for your first class

# Mark Introduction

You can start using Stile at any time, but the perfect opportunity to kick things off is at the beginning of a new unit of learning. Behind the scenes, set aside an hour to familiarize yourself with Stile. Then we recommend spending a lesson with each of your classes showing them the ropes. After that, you'll be ready to teach engaging, collaborative science lessons for the rest of the school year and beyond!

# ⊚ Aim

- · To set up your account in Stile
- · To find engaging, ready-to-teach science lessons for your classes
- To enroll your students and get them ready to learn with Stile
- · To set expectations for student usage of Stile X

# ✓ Procedure

Before you teach your first class

#### 1. Log in to Stile

#### Get your invitation

If you're new to Stile, you'll need to be invited to join by your school's Stile admin – most often a Science Chair or Science Curriculum Specialist. Once you receive your invitation, click the link to set up your account and log in.

#### OR: Go to stileapp.com

If you have a Stile account already, log in with your school email address and chosen password.

#### 2. Create a subject

Your lessons and classes in Stile are organized within subjects. We suggest creating a subject for each grade level that you teach and clearly naming them so they're easy to identify. You might like to include your name, the name of the class, the subject, and the year, e.g., Ms. Smith – 8th Grade Science 2023. Once you've created a subject, select it by clicking on its name. You can see all of your subjects at any time by clicking "Home" in the top left corner of the screen.



#### 3. Explore the teaching and learning resources

Access the Lesson Library from within a subject or head to <u>stileapp.com/library</u> to see all of Stile's units of learning. Be sure to take a look at the Teacher Guide to see how Stile's units align to your curriculum.

Click on a unit to look through the lessons and view helpful resources to support your teaching.

- a. The unit's Teacher Guide Units in the library come with a Teacher Guide that contains details about curriculum alignment, materials required for lab activities and differentiation. It also includes a week-by-week teaching plan to help you decide how you'd like to teach the unit.
- Parent email templates Resources also include an email template that communicates what students are learning.
   Send a copy to caregivers to help bridge the gap between home and school.

Select "Add unit" to make your very own copy. Later, you'll be able to modify lessons to suit your teaching style and the unique needs of your students. These units are ready to teach if you don't want to make any changes.





# Important things to know

Students can only see lessons that are released to them. When a unit is copied from the Lesson Library, all lessons are available to students while assessments (e.g., quizzes and tests) are hidden. We recommend hiding lessons from students using the "Hide all" button at the top of the folder until you're ready to teach them.

#### 4. Connect Stile X



If you aren't using Stile X, you can skip to page 8. Find out more about Stile X at stileapp.com/go/stilex.

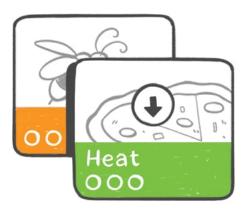
Head to stileapp.com/go/stilexlogin and follow the steps to link your Stile account with Stile X. This will allow you to access all of the learning material available in the Stile X app.

#### 5. Take a tour of the app

a. Once you're all set up, open the Stile X app on your mobile phone and select the QR code icon at the bottom right. In your Stile X booklet, turn to the "Revision notes" and scan the code at the top of the page to view a 60-second video summary of the corresponding lesson. These short, fun videos are great for refreshing the key ideas from a Stile lesson.



- a. Turn to the last page of the "Practice test" section and scan the QR code to view the model answers.
   These support students to self-assess their work and identify areas for improvement.
- a. From the home page, select a unit to view flashcards and access Flash Quizzes. As students work through the quizzes, the app learns what they do and don't know and adapts to help them master the basics.



#### 6. Get your students ready

Ask students to bring their device and mobile phone to class so they can get set up with Stile and Stile X. You'll also need your phone to demonstrate how the app works. If mobile phones aren't allowed at school, students can use the instructions on the inside cover of their Stile X booklet to install the app at home.

#### 7. Get a class set of Stile X booklets



Stile X comes conveniently packaged by unit, so you can distribute the booklets for one unit at a time when you begin teaching it. Collect your students' booklets, ready to hand out in your next class.



#### During class

#### 1. Go to the Students page in Stile

Navigate to the appropriate subject and tap the button in the green header. From this page, you can add or remove students, create class groups, manage student passwords, and add or remove co-teachers.

# Students

#### 2. Instruct students to join

Project the page at the front of the room and ask the class to follow the instructions shown. Remind them to type the full web address to access the correct page.



#### OR: Add students via email

You can use students' email addresses to invite them to your subject. This is especially helpful if a student is absent when you're getting set up. Copy and paste email addresses from a class list to add all students at once.



# Important things to know

We recommend getting set up with Single Sign On so your students can log in to Stile using their existing school email address and password. This will save precious minutes every single class. Reach out to our support team at support@stileeducation.com to find out more.

#### 3. Hand out Stile X booklets



If you aren't using Stile X, you can skip to page 12. Find out more about Stile X at stileapp.com/go/stilex.

Give each student a copy of the Stile X booklet for the unit you'll be working on. Allow some time for them to flip through the pages. Explain that Stile X is designed to help them build their note-taking and revision skills, and to support their understanding of the ideas in Stile lessons.

#### 4. Walk students through each section of the booklet



Use the prompts below to explain how Stile X will support their learning.

#### a. Revision notes

In this section, students create their own revision notes to summarize the important parts of the Stile lesson.

- i. Show students how to access the 60-second video recap using the QR code.
- ii. Demonstrate how to complete the comprehension activity at the start of this section.
- iii. Discuss options for students to find support if they don't know what to do. These include referring to the Stile lesson and scanning for the appropriate subheading to revisit their in-class learning, watching the video recap, and asking a classmate or teacher for help.

# Revision notes Lesson

#### a. Glossary

Students use this section to create a personalized glossary of important words and phrases from the unit. We suggest that this is filled in during class time as they encounter new vocabulary.



#### a. Practice test

This section includes assessment-style questions for each of the learning goals in the unit so students can test their understanding.

- i. Demonstrate how students can access the model answers for these questions, and explain that these are designed to help them recognize if they're on the right track and how their answer could be improved.
- ii. Explain the "Rate my understanding" activity for each question. Students apply metacognitive thinking to reflect on their understanding of the concept and determine their next steps for learning.



#### 5. Help students install the Stile X app

Explain that the Stile X booklets are enhanced by the Stile X app. Bring up stileapp.com/go/stilexlogin and project your screen for students to follow along. You may like to play the video, or walk through the steps on the page together.

#### 6. Set expectations for how students will use Stile X



Let them know when they should have their books in class and when they should take them home, how each of the sections of the booklet will be used to support their learning, and whether you'll be reviewing their work.



#### Teacher tip:

Stile X is designed to empower students in the learning process, so you don't need to grade it! A quick glance at the self-assessment checkpoint will tell you how students are tracking.





# Important things to know

The handy checklist on the next page will help you complete each of the steps described in this article.

# Getting started checklist

This checklist complements "Getting Stile set up for your first class." Once you've read the information on those pages, refer to the list of steps below to help you get set up in Stile. You'll be teaching the world's greatest science lessons in no time!

Before you teach your first class	During your first class
Get logged in  Go to stileapp.com to sign in, or use the link in your invitation email.	Enroll students  Project the Students page or invite them by email.
Explore Stile's teaching and learning resources Review Stile's sequence of learning, week-by-week teaching plans, units, and lessons before adding them to your subject.	Hand out and explore Stile X booklets Give each student a booklet for the unit and show them each section.  Help students install the Stile X app
Connect Stile X and tour the app	Project stileapp.com/go/stilexlogin.
Follow the steps at stileapp.com/go/stilexlogin and see what's available.	Set expectations for using Stile X Let students know how they'll be
Ask students to bring their	using Stile X booklets.
device and phone They'll use these to get set up in class.	Teach in Stile  You're ready to be a Stile-ish teacher!
Collect a class set of Stile X booklets You'll hand these out to students.	Head to page 20 to read about teaching in Stile.



# Stile in the classroom

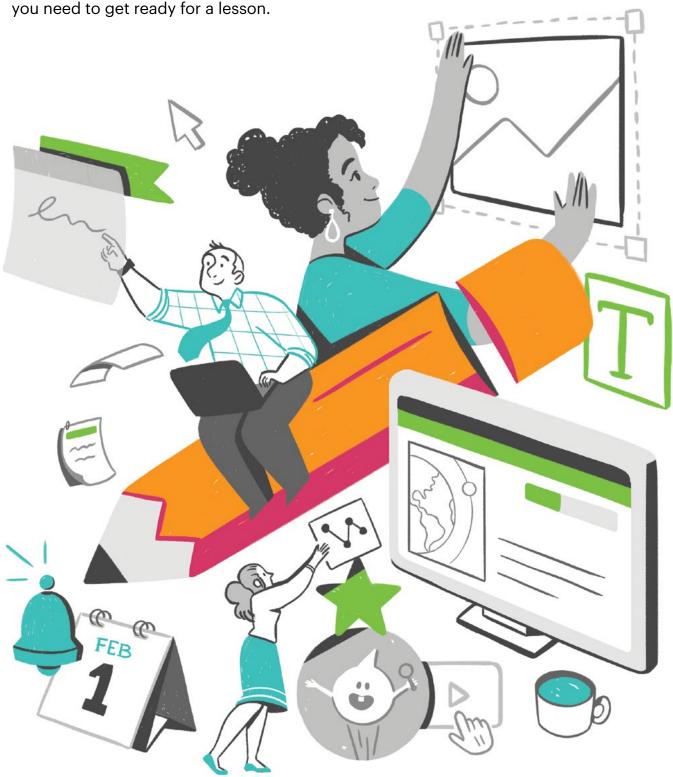
# Prepare - Teach - Analyze

Lessons, exams, and other activities in Stile can be viewed in three modes. These modes correspond to your workflow before, during, and after class, and keep your lesson creation tools separate from your teaching tools. You can toggle between the three modes by clicking the Prepare – Teach – Analyze switch near the top right corner of the page.



# **Preparing to teach**

Prepare Mode gives you everything you need to get ready for a lesson.





# Introduction

Stile lessons are designed to be accessible for all students, while customization tools give you the flexibility to modify lessons so they are perfectly suited to their needs. This gives you the last mile of freedom in how you teach. After all, when it comes to your students and your classroom, you know best.





- · To access background information and teaching tips and tricks
- To make learning accessible for all students by customizing lessons for their specific needs
- To plan how you can use Stile X to support your students

# Procedure

#### 1. View the lesson in Prepare Mode

When you click into a Stile lesson, it will open in Prepare Mode by default. Prepare Mode is a one-stop shop when you're getting ready to teach. Here, you can read comprehensive teaching notes for a lesson and find all of Stile's customization tools. You can access Prepare Mode at any time using the toggle near the top right corner of a lesson page.

#### 2. Review the teaching notes

The detailed teaching notes you see in Prepare Mode are lovingly written by our team of science teachers to help you deliver high quality science lessons. The note at the top of a lesson gives you an overview of the lesson's purpose, explains what students will be doing, how long it will take, and any particular materials or preparation that will be required. Further teaching notes throughout the lesson provide background information about scientific concepts, introduce extra opportunities for class discussion, and provide tips on specific teaching approaches. This information lets you develop a mental game plan, so you're fully prepared to teach a great lesson.



Quiz

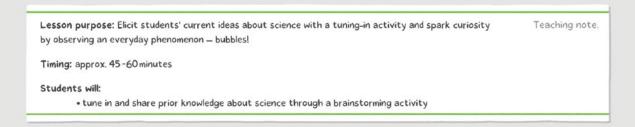
Open ended

investigation

Activity

Simulation

Breaking



#### 3. Open your copy of Stile X



Take a look at the "Revision notes" section that corresponds to the lesson you'll be teaching. Decide if you'll use activities from this section during class time, either as differentiation to support specific students or as a supplement to the Stile lesson for the whole class. You have the flexibility to decide which activities you'll work on together in class, and which activities students will complete at home.



#### 4. Customise the lesson

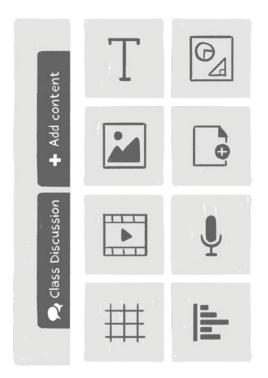
The customization tools in Prepare Mode let you adjust a lesson to suit your teaching style, school curriculum or students' needs. You can change any part of a lesson using the "Edit" functions or build on what's there with the "Add content" menu at the right of the screen. Make each lesson exactly what you need it to be, whether that involves making simple changes to the text, or including whole new questions and videos.



#### Teacher tip:

You may want to print out the lesson and use sticky notes or highlighters to indicate which instructional practices you'll use for each part.

Make sure you take your notes to class!



#### 5. Print off model answers, teaching notes or the student handout

Teaching notes are worth their weight in gold, so you'll want to refer to them in class. You can print a lesson's teaching notes, model answers or student handout by clicking on the printer icon at the top right of a lesson. That way, you can have them on hand while you teach for easy reference. The student handout is the perfect solution for a student without a device.

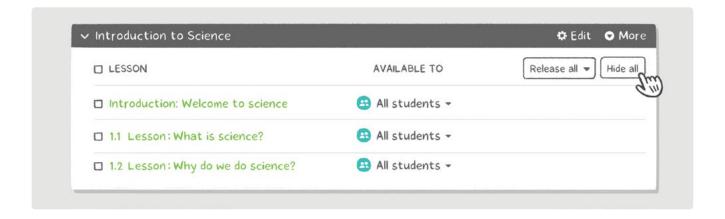
#### 6. Preview the lesson

Once you've finished making changes, click "Preview as student" in the top left of the page to show exactly what your students will see. All teaching notes and editing functions will be hidden, and you can interact with questions to see how they work.



#### 7. Hide lessons and release them as you teach

The lesson release controls let you decide which lessons students can access. We suggest you "Hide all" lessons in a unit from the Lessons page, and then release each one as you teach it. This will help keep students focused on what they're learning, rather than what's coming up. You can even release lessons to specific students as a way of differentiating the pace of learning.



# Important things to know

- 1. The teaching notes are just for you your students can't see them!
- 2. When you're ready to begin teaching, switch across to Teach Mode using the toggle at the top right corner of the lesson.

# **Teaching with Stile**

**Teach Mode** enhances

the collaborative nature of teaching.





# Introduction

**Teach Mode** is your in-class presentation tool, designed to bring your lessons to life. In **Teach Mode**, you can see how students are progressing through the lesson, view their answers, and gain real-time analytics to gauge their understanding on the spot. Having this information so readily available means you can respond to students' immediate needs with timely feedback and support.





- · To facilitate scientific discussions and foster collaboration
- To quickly identify and address individual students' knowledge gaps
- To provide timely feedback on key concepts



#### **Procedure**

Within a Stile lesson, you'll find that you naturally move from direct teaching to independent work, to group work and whole class discussions, and back again. This is by design! We provide collapsible teacher tips above relevant parts of the lesson for inspiration, but exactly how you want to bring each lesson to life is up to you. After all, it's about teaching in your style.



#### Teacher tip:

The teaching notes you read in Prepare Mode can be viewed in Teach Mode too. Click the icons down the right-hand side of the lesson to view useful tips while teaching.

#### 1. Implement direct instruction

Stile is designed to enhance your teaching, not to replace it. We recommend you begin your class with direct teaching using the videos, diagrams and text within the lesson to support you. Before students open their devices, share your screen at the front of the room and introduce the lesson. Watch videos together and pause to explore important concepts, read the text and discuss big ideas.



General



Explicit teaching



Collaborative work



Independent work



Differentiation opportunity



Discussion opportunity



Stile X



#### 2. Use explicit teaching

All Stile lessons have clear learning goals, designed to help students understand the purpose of the learning. When you reach a lesson's learning goals, read them aloud and check that students are familiar with the language being used. Once you've discussed the learning goals, expand the lesson navigation bar on the left of the page and click to view the Key Questions marked with a star icon. Key Questions are derived from the lesson's success criteria, and provide an opportunity for students to demonstrate their success against the learning goal. Showing these to students provides them with a clear idea of what they are working towards.

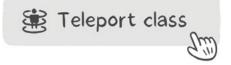


# Important things to know

Stile isn't a "set-and-forget" resource. Students should never work all the way through a Stile lesson on their own – they won't like it, and fair enough! Stile was never designed to be used in this way.

#### 3. Facilitate collaborative learning

When you're ready for students to begin working, ask them to log in to Stile. Click the "Teleport class" button at the top right of the page to transport them to the lesson from anywhere in Stile. With the click of a button, students are in the right place and ready to learn.



Question: Is it cheating to copy ideas from nature to improve an athlete's performance?



Once everyone's in the lesson, use the examples of real-world science to facilitate stimulating discussion between students. Live Polls and Live Brainstorms are a fantastic way to kick off conversations and whole class collaboration. Each of Stile's units starts with an introductory lesson based on recent and relevant science news, perfect to get conversation flowing!

This is also an excellent chance to gauge students' prior knowledge about a topic, so be sure to roam the room and hear what they have to say.





#### Teacher tip:

When students encounter new terminology in the classroom, allow time for them to fill in the "Glossary" section of their Stile X booklet. It will make a helpful tool for revision!



#### 4. Use per-question analytics to track student progress

Once you've looked at a section of the lesson together, ask students to work through a small number of questions. They can do this independently, alongside a partner, or in a small group.

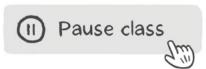
The navigation panel at the left of the page shows a progress bar beside each question that lets you see how students are moving through the lesson. You can see when students are working faster than expected and identify them by hovering over a question's progress bar. This allows you to check in with those students to make sure they're providing detailed answers or to determine whether extension is required.

The response count icon beside each question in the lesson also gives information about who has responded. Hovering over this icon reveals which students have answered, and which students haven't, so you can follow up with those who might need help to get started. You'll also know when everyone's finished responding to a question and is ready to discuss their answers.

#### 5. Discuss answers together

We know it can be hard to compete with a laptop for a student's attention, so when it's time to discuss their answers use the "Pause class" button to bring the class back together. Clicking "Pause class" at the top of the lesson page locks students' screens and directs their attention back to you.

Now that you have their attention, share your screen to review students' work as a class. Click the "Show responses" button beside a question to reveal answers one at a time. Names are hidden in this view (unless you choose to reveal them by clicking "Show names"), so you can discuss and evaluate responses together without identifying who they belong to. Simply scroll between each student's answer using the arrow keys. With this technique, all students benefit from exploring the varied ideas of their classmates, as well as from your input. How's that for timely feedback?



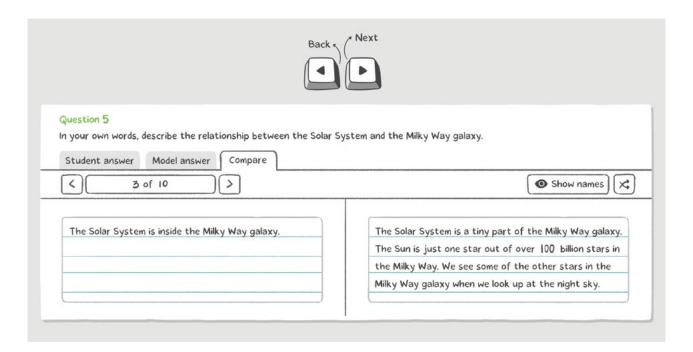


#### Teacher tip:

Use the "Pause class" button to bring students together for direct teaching or class discussion. They'll no longer be able to interact with the lesson, and are directed to look to you for further instruction.



Model answers are another great way to provide feedback. They're embedded into every question, and you'll find them by clicking the "Model answer" button beside each question. Examine the model answer together, talk about its strengths, and then give students time to reflect on and improve their own work.







#### Teacher tip:

Giving verbal feedback to students one-on-one or while sharing student answers at the front of the room will save you hours of typing written feedback!

#### 6. Use Key Questions to identify next teaching steps

Key Questions are an excellent opportunity for formative assessment, so you may not want to share student responses at the front of the room. Disconnect from the projector and review answers as you roam the room and talk with students about their work. You'll quickly identify who is ready to work independently and who needs additional teaching or other support.

Standard Question	★ Key Question	
Scaffold students'     understanding towards     the learning goal	Allows students to demonstrate that they have met the learning goal	Designed to extend students beyond the learning goal
Ideal to discuss and unpack as a class	When answered independently, can be used as formative assessment of the learning goal	When answered independently, can be used as formative assessment of the learning goal
	Marked with icons     that make them easily     identifiable to you and     your students	Marked with icons that make them easily identifiable to you and your students

#### 7. Differentiate with Stile



Stile X is the perfect companion for Stile in the classroom. As you work through a Stile lesson in **Teach Mode**, make the most of the Live Brainstorms and Live Polls to get students talking and collaborating. When it comes time for them to work independently, the Stile X booklet can support or extend students, depending on their needs.

For those who have lower-level literacy or English as a second language, the scaffolded note-taking and comprehension activities in the Revision notes section provide additional structure and support as students build their understanding. For fast-finishers or those who require extension, the Practice test section is a chance to apply their knowledge and test their understanding with assessment-style questions.





# Teacher tip:

Read the helpful "Expert study tip" banners in Stile X aloud in class and remind students about the summary videos, flashcards, and quizzes available in the Stile X app.



Learn what works

Experiment to find which study method is more effective for you and then stick with it!



# **Analyzing student work**

Analyze Mode is the hub of data-informed teaching. Stile does the number crunching in the background to give you insights into your students' learning.





# Introduction

Analyze Mode lets you see student progress at a glance. It shows who has started or submitted a lesson and an overview of how they've progressed through it. By digging a little deeper, you can see each student's response to a question and compare it to the model answer. With an understanding of your students' performance, you can quickly and easily identify misconceptions or misunderstandings and provide timely and specific feedback.



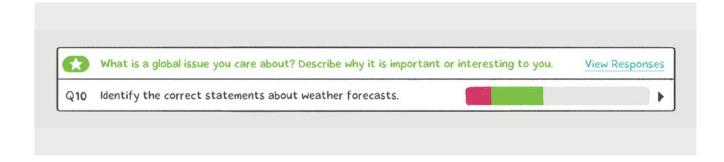
# @් Aim

- To quickly and easily identify misconceptions or misunderstandings
- · To save time with automatically graded questions
- To provide timely, quality feedback where it matters most
- To understand your students' performance to differentiate your teaching

# ✓ Procedure

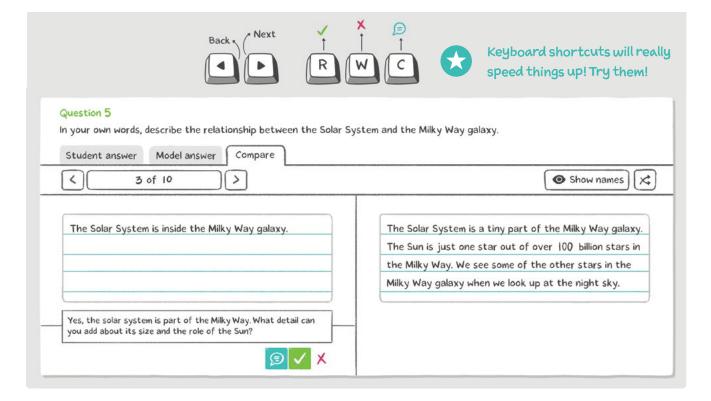
Recognize trends, misconceptions, and misunderstandings to plan for further instruction

The convenient bar graphs in Analyze Mode help you identify how well your students have grasped a concept as a class. These bar graphs are generated from auto-graded questions, giving you easy-to-interpret data without time-consuming grading. If the graph shows mostly red, you'll know that this question needs revisiting in the next lesson. If it's mostly green, you can click on the graph to see which students answered incorrectly and check in with them individually as follow-up.



#### 2. View responses and leave comments

Clicking "View responses" beside a question will open a window where you can view students' answers. Using "Compare" will also bring up the model answer, which you can use to help formulate your feedback. Leaving written comments is as easy as clicking on the speech bubble icon beneath the student's answer and typing into the space provided. You can even leave in-line feedback on specific parts of an answer by highlighting a word or phrase and clicking the pencil icon that appears. Keyboard shortcuts make navigating between responses, grading and leaving comments a breeze!





#### Teacher tip:

Stile provides you with the option to give feedback on every question, but you definitely shouldn't! We highly encourage you to use <u>Key Questions</u> to give feedback where it will be most valuable.

#### a. Auto-graded questions

When students submit their work, they'll receive immediate feedback on multiple choice and Interactive Canvas questions. This frees you up to give written feedback on more cognitively challenging questions that directly address the lesson's learning goals.

#### a. Key Questions and Challenge Questions

In Analyze Mode, both Key and Challenge Questions are shown in green text with their corresponding icon in place of the question number. Key Questions give students an opportunity to demonstrate their knowledge of the learning goal, while Challenge Questions are a chance to show they're working above the level of the learning goal. These questions are highlighted so you can easily identify where your written feedback will be most valuable. You'll be able to rapidly ascertain if your students have met the appropriate standard, while also enhancing the overall quality, timeliness, and effectiveness of your feedback.





#### Teacher tip:

If a student's response to the Key Question doesn't quite hit the mark, refer to the standard questions prior to it. These questions scaffold students towards the learning goal, so you'll be able to identify where assistance is required.

# 3. Reviewing Stile X



Stile X is designed to encourage student autonomy and doesn't require close teacher grading. If you'd like to check how students are doing, we suggest using one of the following strategies:

a. Complete the self-reflection checkpoint in the "Revision notes" section together in class. You could ask students to give a show of hands to rate their confidence with the learning goal or to mark it on the page and leave booklets open on their desks during the lesson. Roam the room while they're working to get a quick idea of who might need extra support.

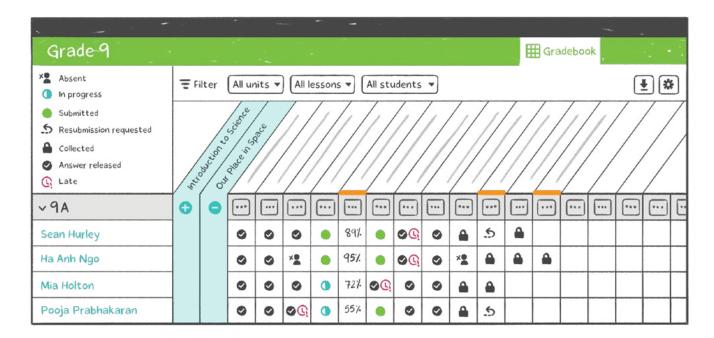




a. As students arrive to class, ask them to open their Stile X booklets to the page they've been working on and leave them in a pile for you to collect. While students work independently during the lesson, glance over the page to get a feel for how they're doing. Pay particular attention to the self-reflection checkpoints where students assess their understanding of the learning goal. You'll quickly recognize students who are stuck or struggling to complete the activities and can discuss this with them directly. Then they can collect their books as they walk back out the door.

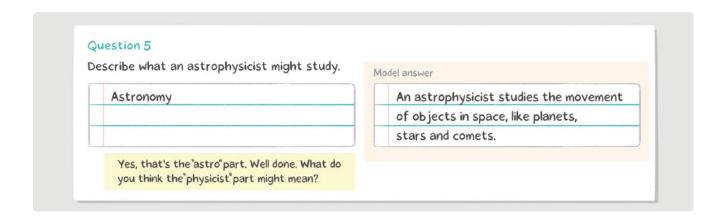
#### 4. Refer to the Gradebook

The Stile Gradebook lets you quickly see how your students are progressing with activities in each subject. You can use it to track and report on their achievement and evaluate trends across the whole class. Turn to page 40 to read more about tracking student performance over time.



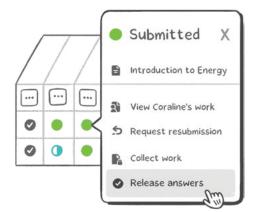
#### 5. Release model answers as a form of feedback

Making model answers visible to students lets them see what a quality response looks like. They can use this to reflect on their own work as well as for study or revision.



Release answers on submitted work by clicking the three dots beneath a lesson's name in the Gradebook and choosing "Release all answers." You can release answers to individual students by clicking on their progress icon in the Gradebook.







#### Teacher tip:

Model answers can be released only to students who have submitted the lesson.

To share model answers with the whole class, click "Collect all unfinished work" first.



# Important things to know

Your students won't be emailed to tell them you've given feedback or released model answers, so be sure to let them know and give them time to review your comments in class!

# Running a scientific investigation

# Introduction

Scientific investigations and hands-on activities are powerful learning opportunities for students. Stile units include carefully planned, exciting lab activities that use commonly available materials. What's more, Stile makes the perfect digital lab book! When writing investigative reports, students can quickly and easily upload and annotate photos or videos, and instantly visualize data as they collect results. By bringing visual components together with written material, students seamlessly connect their lab experience and the scientific content.

With Stile's customization tools and templates, you can even tailor an investigation to different abilities. Develop open-ended, student-led investigations where students pose their own questions, or provide more structured lab activities to focus on following procedural steps.

# **⊚** Aim

- To provide appropriate scaffolding of the scientific investigation process
- To harness Stile's tools to engage students in the process of report writing
- To bring together the practical experience and written aspect of an investigation

# ✓ Procedure

#### 1. Prepare for an investigation

Using an investigation from a Stile unit
 Use Prepare Mode to make any changes to

the investigation for your class. Make sure you refer to the unit's Teacher Guide for details about each lab activity, including the required equipment.







#### Teacher tip:

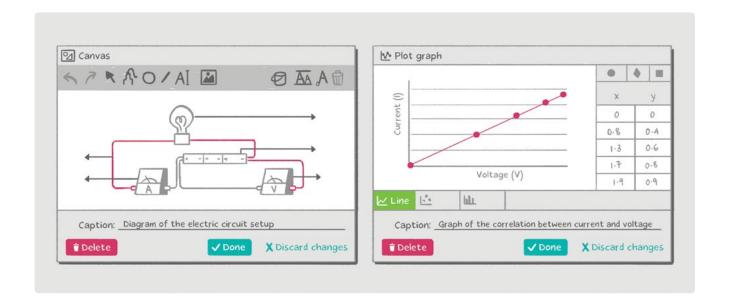
Open Response questions let students add any combination and quantity of text, videos, photos, audio, mind maps, graphs, or tables. You can provide guidance around which tools students should use in the question space or leave the decision up to them.



#### a. Adding an investigation to Stile

Stile's flexible customization tools and templates make it easy to incorporate your own ideas into a Stile lesson. Use the Scientific investigation template from our *Teacher resources and templates* unit in the Stile Library to create your own investigation.

Start by duplicating the lesson so you'll still have a copy of the original template. Then, use the edit menu to add the aim, materials, and method of your investigation. If you prefer the investigation to be more open-ended, you might leave these fields as questions for students to write their own.



#### 2. Run your investigation with students



When it comes time to run the investigation, project the method or instructions at the front of the room using Teach Mode. Students should record observations and data on paper or in their Stile X booklets. Encourage them to capture photos and videos to upload later too! They can annotate their photos by adding them into an Interactive Canvas, like in the diagram on the previous page.

Where relevant, students can add data directly into the Graph tool where it will be visualized right in front of their eyes!

As they work, you can view student responses using Teach Mode and provide verbal feedback where appropriate. Once you've given written feedback after class, ask students to resubmit their work in response to your feedback. This ensures that they read your comments and use them to further their learning.





#### Teacher tip:

Students can log on to Stile with their phones to upload photos and videos right into the lesson.



# Important things to know

Ask students to put their computers aside and to use the notes pages in their Stile X booklets to record results and observations. Once they've completed the investigation, they can type up their report in Stile, and add photos and videos to bring it to life.



# **Further research**

Making your own great investigations in Stile requires mastery of Stile's lesson modification and creation tools. Stile offers a range of professional learning opportunities to help. Take a look at what's available on our website.



# Conducting formative assessment

# Introduction

Formative assessment plays an important role in informing the teaching and learning process. The trick, of course, is to do it effectively and in the limited time available. That's where Stile comes in. The tools within **Teach Mode** help you to keep a finger on the pulse when it comes to student progress. Stile units also include quizzes that are designed to be used as a quick progress check following a lesson. The formative assessment opportunities are endless!

# **Ø** Aim

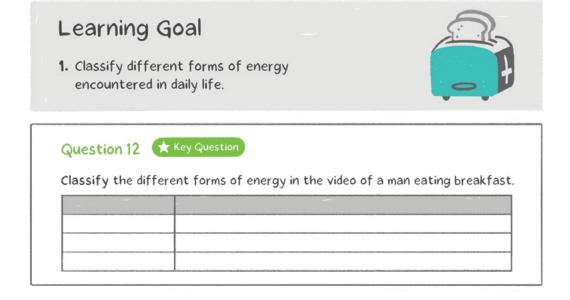
- To understand students' current knowledge
- To provide students with timely feedback

# ✓ Procedure

#### Before class

1. Identify where to give feedback

Skim through the Stile lesson you're about to teach and find the questions labeled "Key Questions." These elicit understanding of the lesson's learning goals.





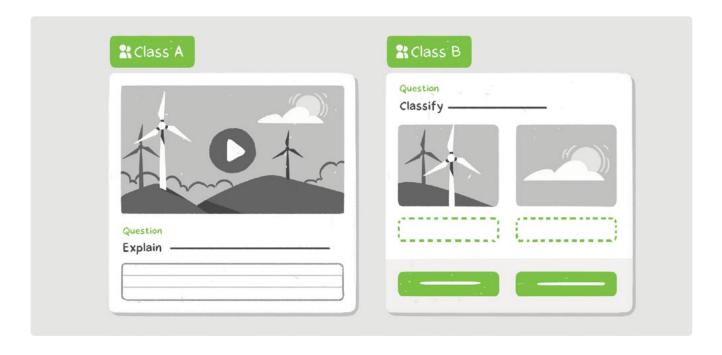
#### Teacher tip:

Many of Stile's units contain a quiz after each lesson.

These are perfect for checking understanding after class or as a refresher at the beginning of your next lesson.

#### 2. Tailor the content to the needs of your class or individual student

Using customization tools to add, remove, or edit parts of the lesson is equally important for assessment as it is for other lessons. You can adjust the lesson to make it more accessible for some students, or to provide an added level of difficulty for others.



#### In class

#### 3. Point out the Key Questions

Key Questions are an opportunity for students to demonstrate that they have met a learning goal. Pointing these out to students at the beginning of a lesson helps them to understand the desired end point and what they are trying to achieve. Students will come to recognize the Key Question icon that appears beside these, but even once they have, providing clarity about what students are working towards is always helpful.



#### 4. Teach the lesson

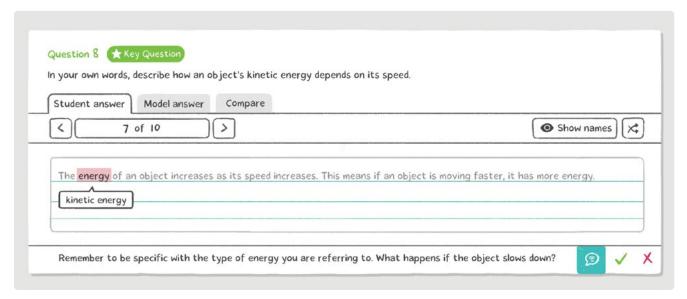
Conduct your class as you normally would (turn to Teaching with Stile on page 17 if you haven't run a class before). Click "Show responses" to view student work in real time and provide verbal feedback.



#### After class

#### 5. Review student work

Click "Show responses" for the identified Key Questions to provide students with written feedback that relates to the learning goal. Typing into the comment box will leave a general statement, while highlighting a word or section of text lets you annotate specific parts of the answer. Once you've finished writing feedback for Key Questions, release model answers from the Gradebook so students can reflect on their work and consider areas to improve. You can read about the Gradebook controls in "Tracking student performance over time" on page 40.





#### Teacher tip:

Remember that students will receive automated feedback on multiple choice and Interactive Canvas questions when they submit their work.



### Important things to know

You don't have to provide feedback on every question! Rather, focus your feedback on Key Questions that address the lesson's learning goals.



### \* Further research

If you're comfortable using Stile for formative assessment, perhaps it's time to try some summative assessment. Turn to the next page to learn about running tests with Stile.



# Conducting

### summative assessment

# Mark Introduction

Running an online test with students can be a little daunting, especially if you haven't done it before. The good news is that summative assessment with Stile is simple, stress-free, and has a lot of benefits, including the time it saves.

## **⊚** Aim

- To save time with automatically graded questions
- · To quickly grade all other types of questions
- To rapidly gain an understanding of gaps in student knowledge
- To measure students' understanding after a unit of work





### Teacher tip:

Stile X is a student's best friend when it comes to studying for tests and exams. You can use it to hold in-class review sessions, or send it home to be used for independent study.

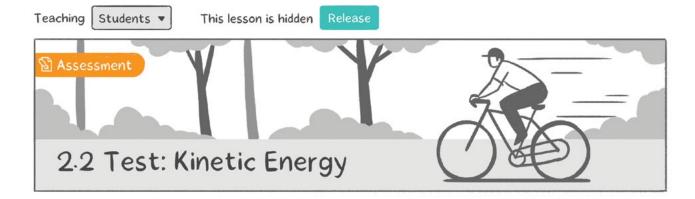
# ✓ Procedure

### Before class

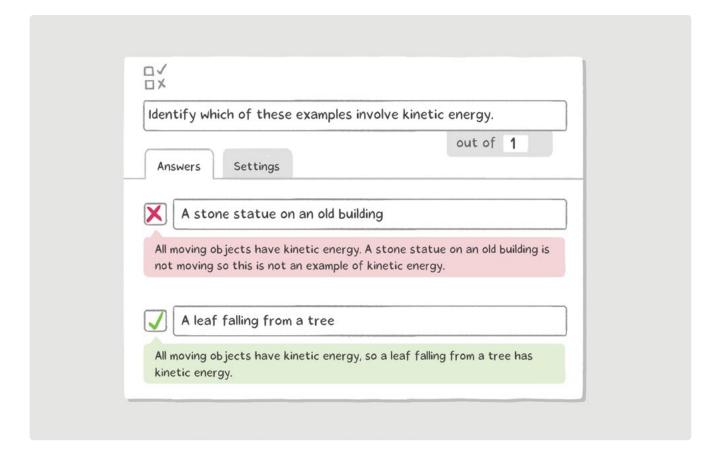
#### 1. Find and set assessment tasks

Most units in Stile have pre-made tests, ready for you to use as summative assessments. When you've completed the teaching for a unit, it's time for students to take the test. First, make sure it's hidden from students by checking the release controls at the top of the page. Quizzes and tests created by Stile will already be hidden by default.

Next, check that the lesson has been set as an assessment. When a lesson is assessed, points are allocated to each question and students are unable to take back their work after submission. The assessment setting is found within the lesson header in Prepare Mode.



Lastly, ensure the appropriate number of points is assigned to each question. To change this, simply click "Edit" next to the question number and type the number in the box directly below the question field.



### In class

### 2. Help students to prepare



There's a Stile X booklet with scaffolded note-taking and revision activities for every unit in the Stile Curriculum. These are ideal when studying for tests and exams! Try holding in-class study sessions where students work on "Practice test" questions and play the games and activities from the glossary's "Game on" section.

Encourage students to make the most of opportunities to learn outside the classroom with the Stile X app. Engaging summary videos, illustrated flashcards, and interactive quizzes mean they can study no matter where they are.



#### 3. Administer the test

To give students access to the test, select the appropriate class group or specific students from the release menu, and deselect any students who are absent. You can then use the information in **Teach Mode** to make sure that every student has started. While students work, monitor them from the back of the classroom where you can see their screens.

Once time is up, ask students to click "Hand in for marking" at the bottom right of their page.

### Teacher tip:

If some students don't hand in their test on time you can "Collect all unfinished work" from the Gradebook to stop them from working. This is just like collecting papers from students at the end of a test.

### After class

#### 4. Grade the test

From Analyze Mode, click "Show responses" and use keyboard shortcuts to swiftly grade questions that require teacher input. Using the Compare tab to view the model answers alongside each student's response will speed things up even further by helping you to formulate feedback. Take a look at "Analyzing student work" on page 23 for more detail.

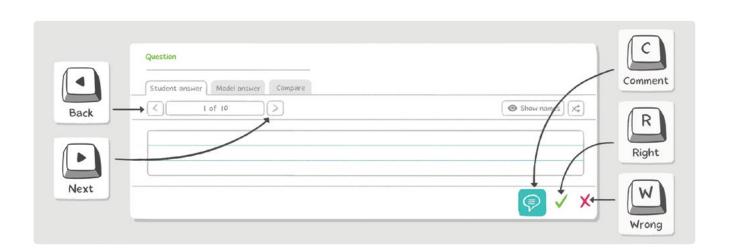
Once all questions have been graded, release the grades and answers from the Gradebook with one click. Click on the arrowhead beneath the lesson name, and select "Release all feedback and answers." This will release your written comments, and allow students to see model answers for all questions in the test. Find out more about the Stile Gradebook by turning to "Tracking student performance over time" on page 40.



### Teacher tip:

Stile's Quick Review has special shortcuts! Use the left and right arrows to move between student responses.

Use "R," "W," and "C" for "Right," "Wrong," and "Comment" respectively.



### The next class

### 5. Review the results together

Discussing the results of a test is an opportunity for students to understand whether their learning and study techniques were effective. Reviewing the model answers as a class will encourage them to reflect on their success and identify points for future improvement. Use the per question analysis in Teach Mode or Analyze Mode to inform which questions you should focus on during this discussion, and any concepts you may need to revisit as a class.



### Important things to know

- 1. Stile's science writers work hard to ensure that our questions aren't "google-able," so students can't simply search for the answer online.
- 2. We suggest that you hide the lessons relating to the test material to avoid an open-book test.



### Further research

Did you know you can have multiple classes complete the same Stile test at different times? The Stile Help Center article named "Differentiate Lessons" will teach you how to do this. Scan the QR code to check it out.



# Tracking student performance over time

# Introduction

Each subject in Stile has its own Gradebook, which shows you a grid view of every student and every lesson within that subject. It's the quickest way to see an overview of your students' activities, while letting you easily narrow in on the details. Once your students have completed work, the Gradebook helps you to track and report on student achievement by keeping all of the information you need in one place. You can evaluate patterns and trends at a class level, or track a specific student's progress and request resubmission of work.

# **⊚** Aim

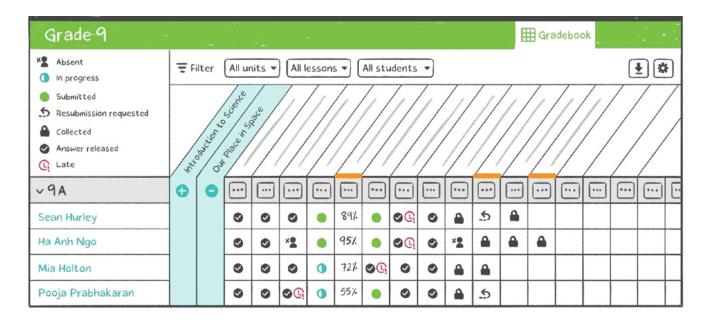
- · To understand your students' performance so you can differentiate your teaching
- To track patterns of behavior in individual student's work
- To provide model answers to students as feedback
- · To request resubmission of student work

# ✓ Procedure

 Easily see a bird's-eye view of your students' progress over time

The Gradebook is organized into a grid, where columns represent lessons and students are displayed in rows. Helpful status icons show you where students are up to at a glance, so you can easily gauge progress both across and within lessons for individual students and class groups. This information can be used to guide differentiation of future lessons and also lets you recognize patterns, such as frequent late submissions.





Filters:

# 2. Filter to view students, units, or released lessons

Use the Gradebook's handy filters to simplify your view and focus on specific information.

Filters let you narrow what's visible to a certain unit, lesson, class, student, or group of students. You can also choose to see only the lessons that have been released to your students, or only assessed lessons.

We suggest filtering your view to show only the unit you're currently

teaching. The Gradebook remembers the filters you've applied, making it easy to see relevant information straight away when you next open the page.





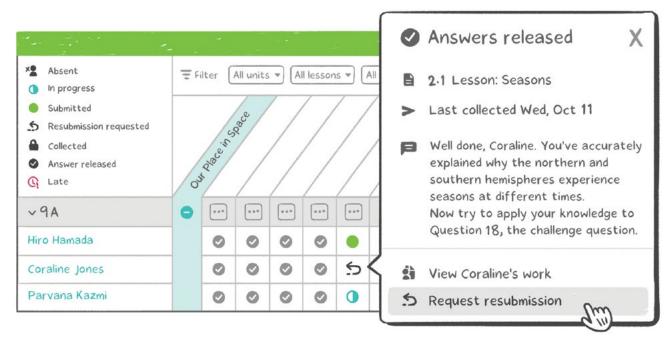
### Teacher tip:

Using the Gradebook's filters along with class controls lets you request resubmission, collect work, or release answers for a specific group of students. This is perfect for situations involving differentiation or group work.

#### 3. Use the tools to view feedback, collect work, or ask for a resubmission

Select the three dots beneath the name of any lesson to view the Gradebook's class controls. The menu that appears lets you perform actions for all students in the class, including collecting unfinished work, releasing model answers, and requesting resubmission. These actions can also be performed for individual students by clicking on their progress icon for a particular lesson.

Asking students to resubmit work lets them use your feedback to guide revisions to their answers. It's an effective way to encourage them to act on your comments and further their learning.



### 4. Digging into a student's work

Sometimes you want to see everything a student has done within a lesson. Clicking on a student's progress icon in the Gradebook reveals additional information about the relevant lesson, including a link to the student's worksheet. Click the link to view their work. The top of the page shows a timeline of their submissions, and you can click into the previous versions to see what's changed.

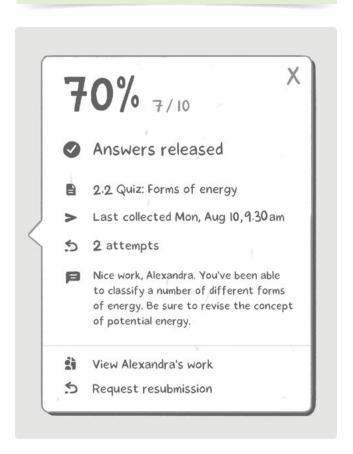
# 5. Writing reports or preparing for parent-teacher conferences

Scroll along a row in the Gradebook to see progress icons for each of your Stile lessons. This will help you to identify patterns that you can discuss at parent–teacher conferences. Clicking on an icon reveals any summary feedback you left for the lesson. You can refer to this record of your feedback to inform your report writing.



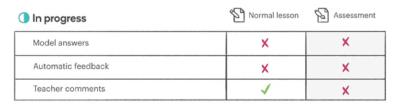
### Teacher tip:

Filter to one student for parent—teacher conferences so you can show an individual's progress over time.



# Student activity at a glance

Stile lessons are set up to fit into a teacher's workflow. Handing in a lesson is designed to work in the same way as a physical worksheet.



When working on a lesson, students can't see the model answers or automated feedback. They will see any comments you make on their work immediately, unless the lesson is assessed.

Submitted by the student [or]		
Collected by the teacher	Normal lesson	Assessment
Model answers	×	×
Automatic feedback	1	X
Teacher comments	<b>✓</b>	×

Once a student's work is submitted or collected, automatic feedback becomes available in addition to any teacher comments. If the lesson is assessed, however, neither automated nor teacher feedback is visible.

Feedback and answers released	Normal lesson	Assessment
Model answers	1	1
Automatic feedback	1	1
Teacher comments	1	1
Marks		1

When feedback and answers have been released to students, they can view the model answer for each question on their page along with automatic feedback and teacher comments. If the lesson is assessed, grades are also made visible.

Resubmission requested by the teacher	Normal lesson	Assessment
Model answers	×	×
Automatic feedback	×	X
Teacher comments	<b>✓</b>	✓
Marks		1

Requesting resubmission encourages students to use teacher feedback to improve their work. Model answers and automatic feedback are removed when you request resubmission, but teacher comments and grades remain.

# **Setting Stile for homework**

# Mark Introduction

While Stile is designed to be used in the classroom, you may choose to assign some tasks for students to complete at home. In this case, it's important that the learning begins with direct teaching at school.

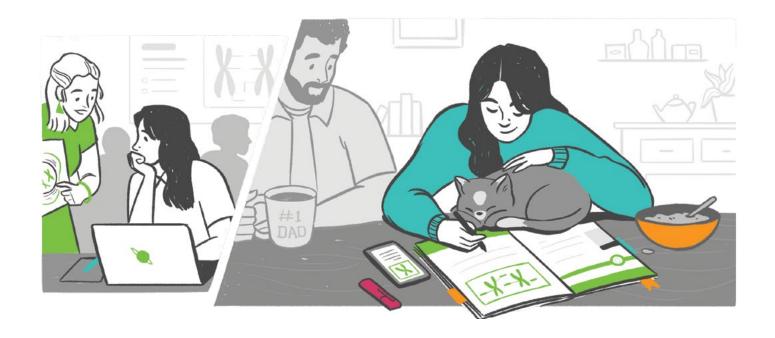
After class, students might complete unfinished questions or improve their responses based on your feedback. Stile X, on the other hand, was built from the ground up to teach students how to study while they study. It's designed to pair perfectly with the digital Stile lessons you already know and love, making it ideal for homework.

### 

- · To support students' learning beyond the classroom
- · To build independent learning skills
- To prepare students to be able to study and take notes independently by the time they reach high school science

### ✓ Procedure

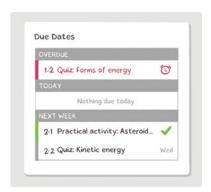
In the same way that Stile lessons can be customized to suit your classroom, Stile X can be used in a variety of ways to support your students' needs. The key is that Stile X provides students with alternate means of expression and multiple, spaced exposures to concepts, whether at school or at home.



### 1. Identify homework tasks



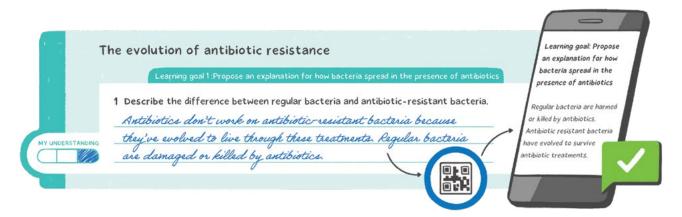
When getting ready to teach a lesson, have your copy of Stile X beside you as you scroll through the questions in Prepare Mode. The combination of a digital and physical resource gives you flexibility to decide which activities you'll work on together in class, and which activities students will complete at home. This may vary from student to student based on their individual needs. Students who benefit from the scaffolded exercises in Stile X might complete these in class while other students use their devices to work in Stile. For homework, those who have already completed the Stile X "Revision notes" pages can use flashcards and quizzes from the Stile X app to master terminology.

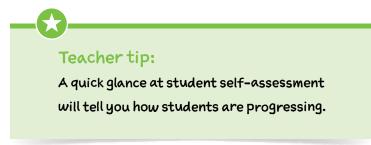




### 2. Assign evidence-based revision activities

After working collaboratively on a Stile lesson in class, assign the corresponding "Revision notes" section of Stile X. Any questions that students haven't answered in class can be completed independently for homework, providing spaced repetition of the lesson's key concepts. By completing this section of the booklet, they'll create a summary of key ideas that makes studying a breeze further down the track.





### 3. Make the most of the Stile X app



Sixty-second videos that recap key ideas from each lesson are at students' fingertips thanks to the Stile X app. Videos are available directly from the app or by scanning the QR code at the top of "Revision notes" pages. Quick, easy access means students can watch them while traveling to and from school or on the way to any extracurricular activities. Flashcards and Flash Quizzes are also available in the Stile X app to master key terms from the unit. Encourage students to use these regularly and build towards completing all three levels of the Flash Quiz.



### Teacher tip:

Read about the evidence-based strategies that underpin Stile X.



### 4. Foster metacognitive skills

Checkpoints are found at the end of each lesson's revision notes, where students apply metacognitive strategies to reflect on whether they've met the learning goals. This self-assessment allows them to recognize when to seek help from you or to revisit a concept independently.



### Important things to know

You don't need to grade and provide feedback on student work in Stile X! In fact, it's intended to help students develop responsibility for their own learning.



# **Hybrid learning**

# Mark Introduction

While Stile is designed to be your ultimate classroom sidekick, its features make it equally well suited to remote and hybrid learning situations. By transitioning seamlessly from school to home and back again, Stile helps you to provide continuity of learning during uncertain times. Co-teacher functions and analytics mean you can ensure students stay on track whether you're at school or not.

## @ Aim

- · To provide students with high quality science lessons in all situations
- To ensure continuity of learning when you or your students can't be at school

### ✓ Procedure

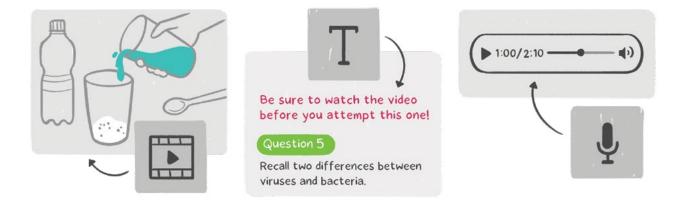
### 1. Make the most of Stile's live teaching tools

Stile's tools allow you to bring a science lesson to life. In the case of school closures, we recommend using Stile as a synchronous learning tool. That means you and your students are online together in a video conference and you're sharing your screen in **Teach Mode**. This is as close as it gets to being in class IRL!



#### 2. Add supporting information to Stile lessons

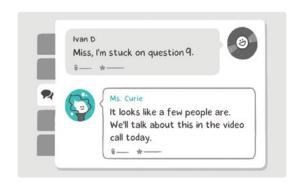
Additional text, photos, videos, and audio files can be added to Stile lessons using the tools in Prepare Mode. Below are some suggestions for using these tools to include extra information that will help students learn when they're away from school.

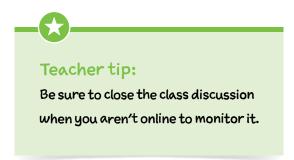


- a. When working on a lab activity in class, take video footage of students completing the hands-on aspects and add it to the lesson. Students at home can use the recording to make observations and complete the associated questions. If you aren't at school, or school is closed, add video footage of yourself or someone else completing the lab activity.
- a. Use the text tool to communicate instructions for homework and revision tasks without needing to send emails. You can make the text a different color so it stands out from other written information in the lesson. Ask students to complete particular pages from their Stile X booklet, or remind them to use the videos and flashcards from the Stile X app for spaced repetition.
- a. Record video or audio instructions and add them to the lesson. Including a screen recording will let you clearly demonstrate what you expect students to do. This will get them off to a great start, whether they're at home or at school.

#### 3. Run virtual office hours

When a number of students are away from school or you're working from home, you may want to offer support and answer questions. We recommend setting a specific time that you will be online and communicating this to your classes. Share a video conferencing link, or open the class discussion in a specific Stile lesson and monitor it for questions. This will save you emailing back and forth with different students and gives them an opportunity to seek support if they need it.







#### 4. Use Stile as your resource hub

Make Stile your go-to for student resources. Keeping everything in one place means it's available to all students, no matter where they're working from. Establish routines in class to emphasize that everything they need can be found on Stile. When logging in from home, they'll know exactly where to go and how to find what they should be working on.

### 5. Have a Stile buddy

In the worst-case scenario, you may be too unwell to modify and assign lessons for your class. It's always a good idea to have your planning saved in a central location and shared with your team so someone else could step in if needed. You may also like to have a "buddy teacher" who has co-teacher status in your Stile classes. They'll be able to assign work to your classes and provide access to a substitute teacher if needed.



### Important things to know

Your school's Stile admin can access a subject to set work or assign a co-teacher. This function is available from the "Manage Staff" button on their home page. They can email us at support@stileeducation.com to nominate an additional admin. It's a good idea to have more than one!

# **Stile Professional Learning**



# Looking to level up your science teaching? We focus on turning the theory into practice with Stile.

Stile Professional Learning – PL for short – is a holistic teacher development program, with a focus on great science teaching.

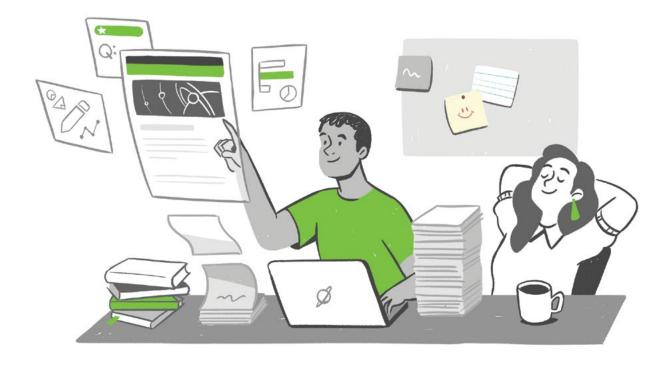
It's an engaging, practical exploration of how to implement evidence-based teaching strategies in the science classroom. Stile's platform and curriculum are used as the tool to illustrate best practices.

Find out more here:



# Stile Concierge is here to help

Over the years, we've built up a great deal of experience helping science departments plan out their units of work. Whether you're completely rebuilding your science curriculum, looking for ways to incorporate Stile into your existing scope and sequence, or want to convert a test or quiz into Stile, our experienced teachers are on hand to help. We can even configure Stile to match your school's existing plans.



Concierge. Just like at a fancy hotel, we're here to help with whatever you need. Stile Concierge is included with every school's Stile subscription.

Need to get in touch with us? Email your request to concierge@stileeducation.com



### Want to learn more?







Stile's office is located in Los Angeles, California, on the land once known as Tovangaar, home of the Gabrieleño-Tongva people. We honor their connection to this region and give thanks for the opportunity to live, work, and learn on their traditional homeland.