**Accessible Information Management
Screen Reader Guide for Students**

# Introduction

This quick start guide is designed to help students who use screen readers navigate the Accessible Information Management (AIM) system with ease. This guide has been updated to AIM Version 5, which is the latest version of the software and has a new interface. Whether you are new to using AIM or have a lot of experience with it, we recommend you review this guide for screen reader users, as it will orient you to the new layout. Note: Your school may refer to the AIM system by a different name. It is the online portal that students use to apply for and manage disability accommodations at your school.

This guide was created by a screen reader user, with the specific training needs of screen reader users in mind. The guide does presume basic skills in using your screen reader, such as launching a web browser, reading commands, and ability to open a webpage. As of this writing, the two most popular screen readers for desktops and laptops are JAWS and NVDA. The most popular screen reader for mobile devices is Voiceover. The Screen Reader Quick Start Guide is written for users of these three software packages. If you use a different screen reader and are new to it, you may want to review the training materials associated with that screen reader before consulting this guide. Also, as of this writing, the most popular web browsers are Mozilla Firefox, Edge, and Google Chrome for desktops and laptops, and Safari for iPhone/iPad. The keyboard commands listed in this guide will work in all three browsers for desktops and laptops. There is a specific section at the end of this guide that describes navigation of AIM for iPhone using Safari and Voiceover.

# Section 1: Overview of Web Browsing Using JAWS or NVDA

This introductory module provides a brief overview of navigating the web on a desktop or laptop. Since AIM is a web-based platform, solid website navigation skills will be essential in having a smooth AIM user experience. If you are already very comfortable navigating websites with a screen reader, you may opt to skip this section. Note that this is not a detailed tutorial on how to customize your web browser or specific web browsing settings in your screen reader. You may wish to consult your screen reader’s help documentation for more information on this.

Most of the commands outlined below apply to both NVDA and JAWS. If a command applies to one screen reader but not the other, this will be noted. A key we will use frequently in this guide is the insert key. Both JAWS and NVDA make heavy use of this key to perform specialized commands that relate only to the screen reader. If you are using a laptop, your screen reader may be configured such that the caps lock is used in place of the insert key. If you are unsure whether your screen reader is customized in this way, try some of the commands as outlined below, first with insert and then with caps lock, to see which key combination works.

## Exploring a Webpage

When you navigate to a website, such as [www.google.com](http://www.google.com), your screen reader will transition to a mode which allows you to browse webpages. In NVDA, this is called Browse Mode. In JAWS, this mode is called Virtual Cursor Mode. When you first land on a page, the screen reader will either place its cursor at the top of the page or at the start of a form field where you could input information, such as a search field. We are using Google’s webpage in this introductory example instead of the AIM webpage because it is a much simpler page with fewer elements to navigate.

You can explore a page’s content on a basic level by using the up and down arrow keys to read the text, as well as explore various page elements such as links, headings, tables, and form fields. You can also use the tab key to navigate down, or forward, through the page elements. To navigate up, or backwards through the page elements, hold down shift and press the tab key. Continuing to press tab or shift tab will cycle you through the elements on the page once you have reached the top or bottom of the page. As you proceed through this guide, you will notice that when browsing the web, pressing the shift key along with another navigation key generally moves your screen reader’s cursor to the previous element instead of the next element. This will be demonstrated later. Pressing control plus the home key takes you to the top of the page, while control plus the end key takes you to the bottom. Pressing insert plus t will tell you the title of the webpage.

## Page Elements

Page elements are features of a webpage which make it easier to navigate. We will review the most common elements found on the AIM website.

* Links take you to another webpage or another part of the same webpage.
* Regions are major areas on a webpage that may represent main or secondary content.
* Headings organize information and are often tiered at different levels. A heading at level 2 will have more specific information related to the information at heading level 1 above it.
* Lists group pieces of related information together.

Later in this section, we will review how to easily jump to a link, heading, list, and other elements.

### Grouping Page Elements

In NVDA, an easy way to organize all the links and headings on a page is to hit the insert key plus F7. You can then arrow up or down through the list. You can jump to a specific link or heading by pressing its first letter. For example, on the Google homepage, after pressing insert plus F7, you can press g to go to the Gmail link, and then press enter to activate it.

In JAWS, pressing insert plus F7 will create a list of links only. Pressing insert plus F6 generates a list of headings, while insert plus F5 generates a list of form fields, such as edit boxes, combo boxes, radio buttons, and checkboxes. Just as with NVDA, pressing an element’s first letter after hitting insert plus F5, F6, or F7 will take you to the element that starts with that letter.

### Form Controls

Form controls are elements on a webpage which allow you to enter information. These include edit boxes, buttons, comboboxes, checkboxes, and radio buttons. There are additional types of form controls which are more advanced. These will not be covered here because they are not used by AIM.

#### Edit Boxes

An edit box allows you to type text. For example, the edit box on Google’s homepage is a search field. Depending on how your screen reader is configured, you may need to hit the enter key on an edit box for the screen reader to allow you to enter information in that box. Both JAWS and NVDA refer to the mode where you can enter data as Forms Mode. Once you move away from a form, your screen reader will automatically toggle out of Forms Mode and back to Virtual cursor mode for JAWS or Browse mode for NVDA.

#### Buttons

Buttons are just what they sound like – Form controls which cause the website to perform a particular function when you press enter on them. There is a Search button on Google’s homepage. Unlike with edit boxes, you do not need to be in Forms Mode to activate a button.

#### Exercise 1.1: Performing a Google Search Using an Edit Box and Button

Navigate to Google’s search page by pressing control plus l and then typing in [www.google.com](http://www.google.com). Locate the edit box, which is the search field on the page by using the up and down arrow keys or the tab and shift tab keys. If your screen reader makes a noise such as a click or pop, it is set to automatically enter Forms Mode when you move your screen reader’s cursor over a form field. If you do not hear a click or a pop, your screen reader may be set to enter Forms Mode manually. To enter Forms Mode manually, hit enter on a form field, such as the edit box on Google’s homepage. Then type in a search string and hit the tab key until you hear “Google Search Button.” Press enter on that button to have Google perform the search. Then use the arrow keys or hit insert plus F7 to explore the search results’ links. You can of course hit enter on any link, and your browser will open that link’s corresponding page.

#### Comboboxes

Comboboxes are lists of options to choose from. For example, when ordering a product online, the product’s webpage will often use a combobox of choices ranging from 1 on up for you to indicate the quantity of that item you would like to order. You will need to be in Forms Mode to activate a combobox. Once in Forms Mode, use the up and down arrow keys to make your choice in the combobox.

#### Exercise 1.2: Searching on Amazon Using a Combobox

Navigate to [www.amazon.com](http://www.amazon.com). Explore the webpage using the arrow keys until you find the combobox which gives you a choice of which department to search in. If your screen reader does not automatically place you in Forms Mode, press enter on the combobox and then use the down arrow key to choose any department. Then press tab until you hear your screen reader announce that you are in a search field. Type something to search for and then press tab until the screen reader says, “go button.” Note that since Amazon frequently updates their website, you may hear slightly different wording when your screen reader announces the various form fields. When your browser pulls up the page of search results, use the arrow or tab keys or, better yet, press insert plus F7 to take you through the search results.

#### Checkboxes

Checkboxes are form elements which allow you to choose one or more options at a time. You can think of them as lists of choices where you are able to place a checkmark by as many items on the list as you would like. To check or uncheck a checkbox, press the spacebar on it. Your screen reader will indicate that the box is checked or unchecked. Just like with buttons, you can activate a checkbox even when not in Forms Mode

#### Radio Buttons

Unlike checkboxes, radio buttons only allow you to choose one item from a list of choices. Sometimes radio buttons are used instead of comboboxes. You can think of radio buttons as choosing a station on a radio. You can only listen to one station at a time. When in Forms Mode, use your up or down arrow key to choose which radio button you would like.

#### Exercise 1.3: Filling out a Sample Survey Using Radio Buttons, Comboboxes, Edit Boxes, and Checkboxes

Navigate to <https://formsmarts.com/form/yu?mode=h5>. You may find it easiest to copy and paste this web address into your browser’s address bar.

This page gives an example of a survey form, showing how radio buttons, comboboxes, edit boxes, and checkboxes work. Explore the page using the arrow keys. Then practice using the various form elements to pretend to fill out the survey. You can hit the escape key to get out of Forms Mode, and you will still be able to toggle the checkboxes as checked or unchecked using the spacebar.

## Tables

A very common way that websites organize information is using tables. While tables are not always built in a way that works well with screen readers, the tables in AIM are carefully designed to be accessible and are a frequent method for displaying data. Once in a table, you will need to hold down the control and alt keys together to navigate the table. With control and alt held down, press down arrow to move down within the current column, up arrow to move up in that same column, right arrow to move right to a different column within the current row, and left arrow to move left within the current row. You will get a chance to practice navigating a table in the section below.

## Navigation Quick Keys

Now that you are familiar with various types of page and form elements, there is a very easy, one-key way to jump to the next occurrence of a specific type of element on a page. Pressing shift plus that same key moves to the previous occurrence of that type of element. This is a very efficient way to navigate the AIM site. Navigation quick keys will be referred to frequently in the remaining sections of this guide.

The list of navigation quick keys below is organized in a table. Use your table navigation skills that you just learned to navigate this table.

|  |  |
| --- | --- |
| Element | Quick Key |
| Next radio button | a |
| Next button | b |
| Next combobox | C |
| Next edit box | E |
| Next form field of any type | F |
| Next region | r (JAWS), d (NVDA) |
| Next heading at any level | H |
| Next heading at level 1 | 1 |
| Next heading at level 2 | 2 |
| Next heading at level 3 | 3 |
| Next list item | I |
| Next list | l |
| Next table | t |
| Next checkbox | x |

## Quickly Finding Text

Sometimes, you may be looking for something on a webpage, but you don’t know what type of page element it is. Or perhaps what you’re looking for is simply a piece of text. For example, suppose you do a Google search for the phrase “best screen reader,” and you want to find out if the screen reader you use comes up in the search results. You can use the Find command to locate a particular piece of text, like NVDA or JAWS, and the screen reader will then place its cursor on that text if it can be found anywhere on the current webpage.

Using JAWS, this command is probably familiar, control plus f. In NVDA, you will need to use insert plus control plus f. Then type in the search string you’re looking for and press enter. You may find that this saves you a bundle of time once you get to know a website well and know what you are looking for. Your sighted peers may be spending a lot of time scrolling down the page to look for the text. Meanwhile, you are able to find it in only the amount of time it takes you to type in a search string and press enter.

## Conclusion to Overview of Web Browsing with NVDA and JAWS

This concludes the basic webpage navigation part of the tutorial. Your screen reader’s help documentation has much more detailed information, which you are encouraged to review if you are new to web browsing and want to learn more. But the basic skills covered above will get you started in using AIM. Once you are comfortable with the exercises in this section, you are ready to move on to the next section, Navigating AIM.

# Section 2: Navigating AIM on a PC with NVDA or JAWS

Now that you are familiar with web browsing basics, let’s apply what you’ve learned to navigating AIM’s site specifically. This section gives an overview of how the site is laid out, some common elements on each page, and some tips and tricks that will help you navigate the site with ease, no matter what page you are on. A section on navigating AIM using an iPhone and Voiceover is found later in this guide.

## First Things First

To get started, open the login URL on your school’s disability services website. This will be different for each school. Complete the login process so that you are signed in. This will take you to the Dashboard page, which is your jumping-off point for all AIM tasks.

Each school has customized AIM to meet their specific needs. Therefore, this guide will focus on a general overview of how AIM pages are laid out and give suggestions for how to navigate the site.

Note that the items on each page are described in the order in which you would encounter them as a screen reader user. While sighted users experience a webpage by seeing content on the left and right sides of the screen, screen reader users experience the content on webpages as one long column of information. Generally, screen reader users do not find it very helpful to be told that something is on the left or right side of the page, since we have no way of discerning whether our cursor is on the left or the right. We will therefore avoid describing the location of the items on the AIM site by referencing which side of the page they are on.

## Navigation Tips

AIM makes extensive use of both regions and headings on all of its pages, to enhance navigability for screen reader users. It is recommended that you use the hotkey for region to get to the main part of a page you're looking for, and then the hotkey for heading to find something specific within that region. For JAWS users, press r to go to the next region, shift r to go to the previous region, h to go to the next heading, and shift h to go to the previous heading. NVDA users, press d to go to the next region, shift d to go to the previous region, h to go to the next heading, and shift h to go to the previous heading. NVDA users, please note that the hotkey d has two functions, both next region and next landmark.

## My Dashboard

The page where you will always land when you first log into AIM is called My Dashboard. From this page, you can jump to any of the modules that you will use in managing your accommodations.

The first link on every AIM page is a Skip to Main Content link. Pressing enter on this link will jump you to that page’s main region area, skipping over the links to the various modules and tools on the page. Below that, your screen reader will announce whether you are in desktop view or mobile view. If you are using a mobile device or screen magnification software, you will hear “Mobile View.” If you are using a PC without any screen magnification, you will hear “Desktop View”.

Immediately below the notification of desktop view or mobile view, you will find the Module Search menu, which gives you the option to search for something specific. Your screen reader will announce that the menu is collapsed. Press enter on it to open the menu. Once expanded, you will encounter a search edit field where you can type a key word for a module or tool you’re looking for. For example, if you are looking for the Alternative Testing module, you can begin typing the word “testing,” and the system will begin presenting you with menu choices that match that search. Once your screen reader announces that search results have populated, use the down arrow key to see the list of results. Note that AIM will start populating search results after you’ve typed only three or four letters. On every page, directly below the search you will find a link to My Dashboard, so you can always activate this link to go back to the dashboard landing page.

If you would prefer, you can skip the searchable menu altogether and navigate to the Section Navigation region and a heading at level 2 called My Dashboard. Here, you will see a list of links to various tools that pertain to you based on your accommodations and the modules your school uses. Directly below this, you will find another heading at level 2 called Accommodations. Again the list of links to modules here will vary depending on your accommodations and the AIM modules your school uses.

The next region you will encounter is the Main region. Each screen in AIM will have a Main Region, and the content of that region will change based on which page you’re on. For example, if you’re on the My Dashboard main page, the Main Region is where you can view your accommodation requests, request additional accommodations, see the name of your primary counselor or access coordinator, and view your to do list. Your to do list is a list of accommodation-related tasks you may need to attend to, such as a reminder to notify faculty about your accommodations, request books in alternative format, schedule exams, etc.

On other AIM pages, the main region content will be different, depending on the screen you are on, while the content above it will be the same no matter which screen you’re on. At the top of the Main Region section of each page, you will find a You Are Here section. You can think of this section as a series of breadcrumbs. It tells you which page you’re currently on and lists the page or pages that the current page links from. Note that you can always click on the My Dashboard link to go back to the landing page.

A detailed review of the navigation and operation of each module is beyond the scope of this guide. Use the web browsing techniques covered earlier in this guide to familiarize yourself with the layout of the Main region of each module you may be using. You should also contact your school’s disability services or accessibility office for guidance on using the other pages on the AIM site.

For now, we will only do a detailed review of the Main region found on the My Dashboard page. This is the page you will use to notify your faculty about your accommodations and view current accommodation requests.

### Notifying Faculty About Accommodations and Viewing Approved Accommodations

Review this section if your school requires that students log into the AIM website to notify your faculty about your accommodations and request them for specific classes. First you will select the classes where you wish to use one or more accommodations. Then on the next page, you will select which of your approved accommodations you would like to use for each class.

#### Requesting Accommodations

From your Dashboard page, which is the page where you will land when you first log in, navigate to the region called Main Region and look for a

link that says, "Add requests for X classes," where X is the number of classes you are currently registered for. After activating that link, you will be taken to a page listing the classes where you can request accommodations. Press the quick navigation key x to go to the first checkbox on the page, which will be labeled with the course number for one of your classes. Press the spacebar to check the box if you want to request accommodations for that class. Then hit x to navigate to the checkbox for the next class and press spacebar to select that class as well. Repeat this process for as many classes as you would like to receive accommodations in. There is also a checkbox you can check if you would like to have the same accommodations applied to all classes you have selected. Then hit enter on the button that says Continue to next step.

On the next screen, you will select the accommodations you would like to use for each course that you chose on the previous page. Note that if you checked the box to apply the same accommodations to all selected courses, you will only see your eligible accommodations listed once. If you did not select that option, each course will be listed under a heading at level 3, followed by checkboxes for accommodations you may select for that course. Be sure that you locate all the courses on this page where you would like to use your accommodations. Once you have selected checkboxes for all accommodations and all courses, you will have one more box to check, which is the accommodations agreement. This agreement language will differ for each school. Review that accommodations language carefully, press the spacebar to select the agreement checkbox, and press enter on the button labeled Submit Request. Depending on how your school has configured the AIM site, submitting your requests will either auto-generate a notification of your accommodations to your faculty directly, or it will place your request in a queue for your disability services or accessibility office staff to approve and send to your faculty.

#### Reviewing Current Accommodation Requests

To review a list of accommodations you have already selected for the current term, navigate to the Main region, and look for a heading at level 2 called Accommodation Requests. The current term will also be included in that heading label. Under that heading, click the link called View Request Detail. From there, look for the heading at level 3 labeled with one of your course numbers. Press the down arrow from there to see the status of your request, modify the request, send an email to your instructor notifying them of your selected accommodations, print a PDF notification letter of your accommodations, or review the list of accommodations selected. Note: To review the list of selected accommodations, press enter on the button to expand the request summary.

# Section 3: Navigating AIM on an iPhone Using Voiceover

In this section, we will give an overview of the My Dashboard page using an iPhone with Safari and Voiceover. We will describe how to request accommodations for your classes or view existing requests. This guide presumes that you are proficient in using your iPhone with Voiceover, and that you are able to navigate among headings, form fields, and other page elements either by swiping right or, more efficiently, using Voiceover’s rotor to navigate to the desired type of page element.

First, log into your school’s AIM site. You will be taken to the My Dashboard page, which is the jumping off point for all tasks you may need to complete. The first link you will encounter is the Skip to Main Content link. If you double tap on this link, it will take you directly to the Section Navigation links, which you can use to navigate the site.

If you do not press the Skip to Main Content link, the next thing you will hear when swiping right is an announcement that you are in mobile view. Since you are on a mobile device, AIM automatically shows you a version of the website which is uncluttered and optimized for navigation by mobile devices. This means that if you also navigate AIM on a desktop or laptop, you may not see some menu items that you are accustomed to, and the layout is somewhat different.

Swiping right again after the announcement of mobile view, you will reach the Module Search menu, whose default state is collapsed. Double tap on this to expand it to search for a specific module or task. Once the menu is expanded, you will immediately be able to double tap again to enter a text field where you can start typing a keyword. For example, suppose you want to quickly locate the Alternative Testing module for the purpose of scheduling an exam. You can simply type the word “test,” and AIM will offer you the Alternative Testing page.

Continuing to swipe right past the module Search menu, the next items you will encounter are My Account, where you can adjust preferences and contact info, and Help. Swipe right again and Voiceover will announce Section Navigation Links, which is an expandable menu. Double tap on this to see all the tools and modules you have access to, based on how your school has customized AIM and the accommodations you are approved for. We will not go into detail about each option in this menu since the modules you see and how each one operates depends on your accommodations and the way your school has customized their AIM site. However, we encourage you to use your understanding of AIM’s basic layout on mobile to explore each individual module. Contact your school’s disability services or accessibility office if you have specific questions.

If the Section Navigation Links menu is left collapsed, you can swipe right again, and Voiceover will announce “Overview” which is at heading level 1. Note that if you navigate to another page within AIM, this heading will not say “overview” but rather will announce the page you’re on, such as Alternative Testing or Accommodation Requests.

After that heading, swipe right to be placed on the You Are Here main landmark. This acts as a series of breadcrumbs, to show you which page you’re on and which pages the current page is linked from. Note that you can always double tap on the My Dashboard link to go back to the landing page.

## Viewing and Requesting Accommodations

Review this section if your school requires that students log into AIM to notify their faculty of their accommodations and request them for specific classes. First you will select the classes where you wish to use one or more accommodations. Then on the next page, you will select which of your approved accommodations you would like to use for each class.

From the My Dashboard screen in the Main region, you are able to continue swiping right, past the You Are Here section, or use the rotor, to navigate to a heading at level 2 called Accommodation Requests. From here, double tap on the View Request Detail link to see the details of your requested accommodations for any classes where your accommodation requests have already been made. You may also modify accommodation requests in the View Request Detail section.

To add new accommodation requests, double tap on the next link called Add Accommodation Requests for X Classes, where X is the number of classes you are currently registered for.

On the Add Request screen, the first link you will see is a Skip to Form link. If activated, this will take you directly to the first checkbox for a class where you can request accommodations. You may check the box to indicate that you would like accommodations for this class or continue swiping right to locate another class or classes where you would like accommodations. Note: If you do not see one of your classes on this page, it may be that accommodations have already been requested for that class. If that is the case, you can modify your accommodation request as described above.

Once you have checked boxes by all classes where you would like to request accommodations, you will see another checkbox which will give you the option of applying the same accommodations to all classes you selected. You may want to check this box if you use identical accommodations for all your classes, as it will pre-select accommodations and save you time on the next step.

Swipe right and activate the Continue to Next Step button. On this page, you will again see a Skip to Form link at the top of the page. Activate this to be taken directly to the list of checkboxes for your approved accommodations. If you opted to select accommodations for each class individually, you will see a series of checkboxes by each class. If you opted to select the same accommodations for all your classes, you will only see one set of accommodation boxes to check.

After you have selected accommodations as desired, you will need to check one more box, which is the Accommodation Agreement checkbox. The language for the Accommodation Agreement is different at every school, so we will not go into detail on the content of this agreement here.

Once the Accommodation Agreement box has been checked, the final step is to double tap on the Submit Request button. Depending on the process in place at your school, submitting the accommodation request will either immediately autogenerate a notification letter to your faculty about your accommodations, or it will put your accommodation request in a queue to be approved by staff at your disability services/accessibility office and then sent out to faculty.

# Conclusion

We hope you have found this guide helpful in getting you oriented to the AIM site, either on a desktop, laptop, or mobile device. If you have questions about how to use the site, please contact your school’s disability services or accessibility office. AIM staff work hard to ensure that all aspects of the site are fully screen reader accessible. However, if you should encounter any accessibility challenges, please notify your school’s disability services or accessibility office right away so that they can report the issue to AIM’s tech support team to be addressed.