

# CS3733-D18-D02 Project BW3D User Manual

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|                     |
|---------------------|
| M - Manly Minotaurs |
|---------------------|

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Welcome to the Manly Minotaurs' Application Manual! Here you will be instructed through all of the features in regards to the Minotaurs' Pathfinding Application, Map Builder, and Room Service API. This application was designed, developed, and released in D-Term 2018 at Worcester Polytechnic Institute.

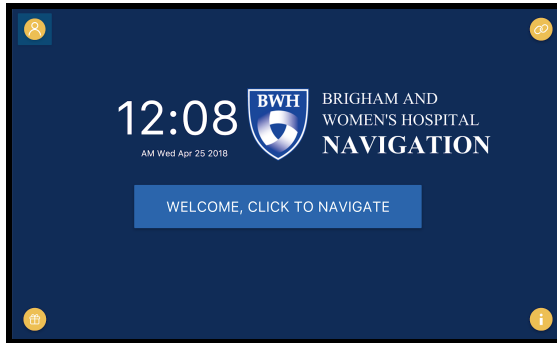
Enjoy!

- The Manly Minotaurs Team

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# Part 1: Launch Screen

## Section 1: Launch Pad



The application starts off at a launch pad that allows the user to access the different features of the app. At first glance, the screen displays the current time and date. In the top left corner, an admin or staff member can press the login button to access admin functionality as described in part 3. In the top right corner, the user can connect press the link button to access patient portal created by Brigham and Women. In the bottom left corner, the user can press the gift shop button to view the gift shop API designed by Team O which allows user to browse the hospital gift shop inventory and purchase items. In the bottom right corner, the user can press the about button to view the about and credits page for the application. To access the main navigation application, the user can press the large button in the center of the screen to enter into the pathfinding application which is described in part 2 of this document.

### Section 1a: Launch Buttons Explained

#### *Begin Navigation Button*

This button is the big blue button that lies on the welcome screen. Press this to begin navigation.

#### *Login Button*

This button lies in the top left corner of the welcome screen (icon of a person). Click on this to log into your admin/employee account for additional features. NOTE: This login feature is solely for hospital staff as it gives a user access to features only accessible to specific Brigham and Women's personnel.

#### *Portal Launcher Button*

The portal launcher button is located at the top right of the welcome screen (icon of a website link) and will open up a website to the Brigham and Women's Hospital patient portal login screen.

#### *About Button*

The about button (located in the bottom right of the welcome screen) will pop up with a textbox of the application info, team members, and a thank-you message to Brigham and Women's Hospital.

#### *Gift Shop API Button*

This button is on the bottom left and launches Team O's gift shop API.

## Part 2: Pathfinding Application

### Section 1: Map Buttons Explained

The Manly Minotaurs' have a clean User Interface with minimal yet effective buttons, to give the application maximum functionality at minimum screen clutter. The buttons are also in the color #102c57 to match the Brigham and Women's Color Scheme. Here is an explanation for each button:

#### Section 1a: Navigation Screen

##### *Floor Buttons*

The floor buttons are located on the top left of the navigation screen. Click on a floor number to change the current map display to that floor. The currently selected floor is also snapped to the right slightly and is in yellow font.

##### *Map Rotation Buttons*

The map rotation buttons are located on the bottom left of the navigation screen and are 3 buttons: a left pointed round arrow, a compass, and a right pointed round arrow. To rotate the map, simply press either of the two buttons to rotate the map, either 3d or 2d, left and right. The compass icon in the middle will rotate as well to show which direction the screen is rotated to at that moment. Click on the compass in order to snap back to the original rotation setting (straight up and down).

##### *Zoom Slider Button*

The zoom slider is located right below the map rotation buttons and zooms the screen in and out. Slide the slider all the way to the right for maximum zoom.

##### *2D-3D Switch Buttons*

The button to the right of the zoom slider button will change the view of the map from 2D to 3D. Click on the icon to show the map in 3D and the icon will update with the characters '3D'.

##### *Help Button*

The button at the bottom right of the screen with the question mark icon is the help button. Click the help button for a pop-up of how-to's that will display instructions next to every button.

##### *Home Button*

The home button at the bottom right of the screen will take the user back to the home screen

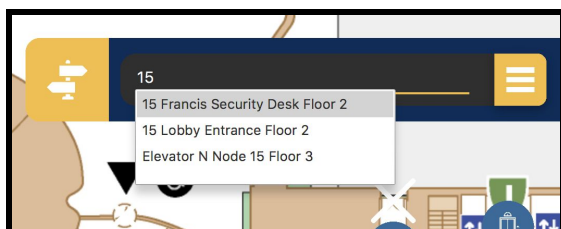
### Quick Directions Button

The quick directions button when pressed will show three new icons: a bathroom, an elevator and an exit. Click on any of those buttons for quick directions from the current kiosk for directions to the nearest of that type.

### Direction Bar

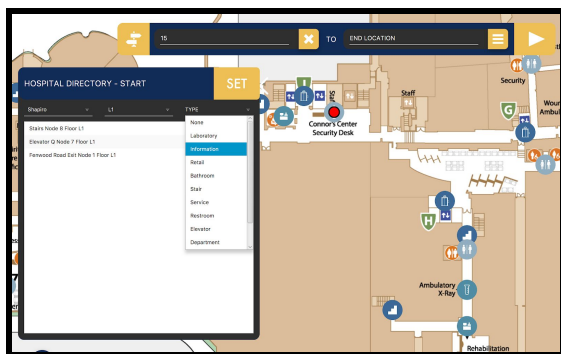
The directions bar is located on the top of the navigation screen and is used for directions.

## Section 2: Entering a Starting and Ending Location with autofill



On the welcome screen press the big blue “Begin Navigation”. This will launch the map. On the top center of the application lies a bar with several buttons and the words “Start Location” and “End Location”. In order to do simple directions to known locations, simply type in each location and an autocomplete table will appear right below with potential locations. The “Start Location” will be defaulted to the current kiosk location. Either finish typing or click on one of the listed locations to see your start and end points fill into the bar. Press the play button to the right to start navigation.

## Section 3: Entering a Starting and Ending Location with the Hospital Directory

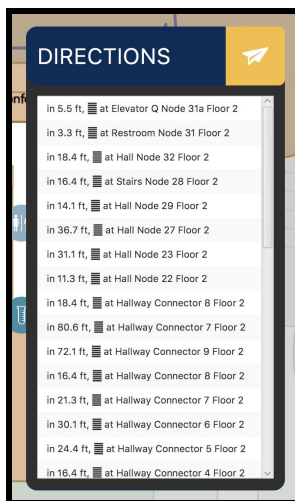


Press the icon with the 3 lines next to the start or end location text fields in order to search via the hospital directory. This will prompt a mini-screen with the ability to search for a node by floor, node type, building, etc. Once a location is selected, press the set button to set the location to the text field. Press the play button to the right to generate a path.

## Section 4: Entering a Starting and Ending Location by touching points on the map

When the application starts, the accessible locations are shown on the map with their respective icons. You may select a location by simply selecting on the location icons. At the beginning of your navigation experience, if the user clicks on a location, the end text field location will update to that specific location. If you click on the start text field, then the next node you click on will update the field with your selected location. Press the play button to the right to start navigation.

## Section 5: Viewing your directions



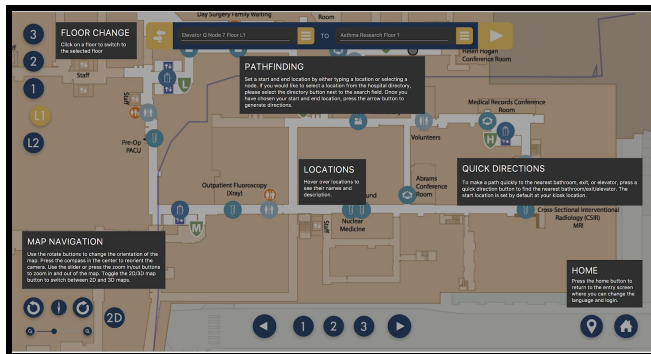
After the play button is pressed, a navigation screen will pop up. To the left of the search bar is an icon with signs on it. Press this icon to toggle textual step-by-step directions with distances to each location and an estimated time of arrival. On the navigation screen, the starting floor will be chosen and an orange path will be drawn either to an elevator/stairway or an end-flag. An animated arrow will repeatedly follow the path in the proper direction. On the bottom of the screen will be three floor names and two arrows as bookends. Click on either arrow to move to a previous step or future step in the navigation. Press any of the 3 floor buttons in the middle to see the path across that floor.

## Section 6: Emailing or Texting your directions

In the text-by-text directions, press the send button and see a screen pop up with the ability to email or text directions to a specified number or address.



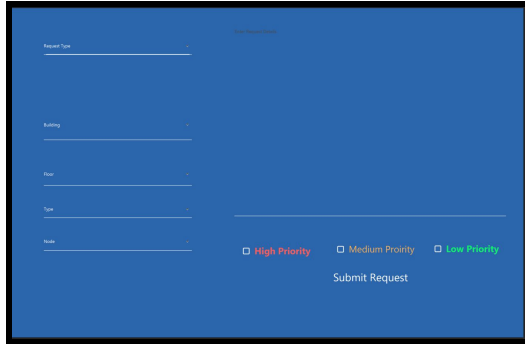
## Section 7: Viewing Help Screen



Press the help button (see section 1b for more information) to see various instructions next to buttons. Tap anywhere to make the instructions disappear

## Part 3: Admin Screen

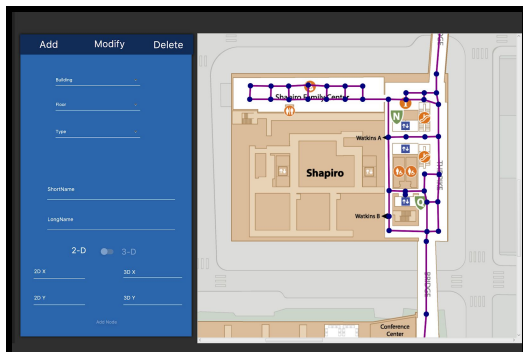
### Section 1: Create Requests



The screenshot shows a 'Create Request' form with a blue background. On the left, there are five input fields: 'Request Type', 'Building', 'Room', 'Type', and 'Date'. To the right of these fields are three radio buttons for 'High Priority' (red), 'Medium Priority' (blue), and 'Low Priority' (green). Below the radio buttons is a 'Submit Request' button.

In this tab, first select a request type from the dropdown tab. Then choose the location the request. Enter request details, choose a priority, and submit the request. This will show up in a requests table and can be assigned to a nurse, marked as completed, or deleted.

### Section 2: Node Manager



Select the node manager tab to enter the node manager screen. Enter node information to add a node. Press on a node to see its information in order to update it. A node turns green when selected. Click on a node and press the delete button to delete a node. Select up to two nodes at once, if another is selected, the previously first selected node will become the new third selected node. If you have two nodes selected, the most recent one selected will be deleted or modified. When two nodes are selected, you can choose to add or delete the edge between them with the toggle button, which will indicate whether or not an edge is being added or deleted. . If a node is green, click and drag to move its position. The position will be saved upon mouse release. NOTE: edges added/deleted in 2D will update in 3D, however node position in 2D is not mapped to 3D. A user can move and adjust the 2D and 3D nodes separately for their best alignment.

## Section 3: Account Manager

Add User

Modify User

Delete User

First Name

Middle Name

Last Name

Language

User Type

Username

Password

Add User

In the account manager tab, users can add/delete/modify current users by entering their User ID.

## Section 4: Kiosk History

Filter

Filter by Type

Filter by User ID

Clear Filter

| User ID | Event Time              | Description      | User ID | Node ID | Type |
|---------|-------------------------|------------------|---------|---------|------|
| 1       | 2016-04-17T10:13:11.638 | Stained Database | N/A     | N/A     | N/A  |
| 2       | 2016-04-17T10:14:15.814 | Stained Database | N/A     | N/A     | N/A  |
| 3       | 2016-04-17T14:46:09.742 | Stained Database | N/A     | N/A     | N/A  |
| 4       | 2016-04-17T14:46:50.142 | Stained Database | N/A     | N/A     | N/A  |
| 5       | 2016-04-17T14:47:33.935 | Stained Database | N/A     | N/A     | N/A  |
| 6       | 2016-04-17T14:52:36.791 | Stained Database | N/A     | N/A     | N/A  |
| 7       | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 8       | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 9       | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 10      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 11      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 12      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 13      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 14      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 15      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 16      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 17      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 18      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 19      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 20      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 21      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 22      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 23      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 24      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 25      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 26      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 27      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 28      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 29      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 30      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 31      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 32      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 33      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 34      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 35      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 36      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 37      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 38      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 39      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |
| 40      | 2016-04-17T14:47:30.849 | Stained Database | N/A     | N/A     | N/A  |

Description

Type

Time Stamp

LogID

UserID

NodeID

Rev...

Remove

In the kiosk history tab, users can look at a table of past actions that occurred in the application and see a log. The user is also able to remove items from the log or undo

## Section 5: Room Service

This tab will open the Manly Minotaurs' room service API. See part three for more details.

## Part 4: Room Service API

### Section 1: Request Room Service

The screenshot shows a web interface for the Room Service API. It is divided into two main columns. The left column has a 'ROOM NUMBER' input field at the top. Below it is a table with 'ITEM' and 'QUANTITY' headers. A blue button 'ADD SELECTION TO CART' is positioned below the table. Underneath is a 'CART' section with a table and a blue button 'DELETE FROM'. At the bottom of the left column is a blue button 'SUBMIT ROOM SERVICE REQUEST'. The right column is titled 'INVENTORY MENU' and contains a large empty box with the text 'No inventory to display'.

This is the opening tab on the Room Service API. It is split into two columns: adding a request and viewing the inventory. To add a request, enter a room number. Then, select an item from the dropdown tab. Any item already in the hospitals inventory will be viewable on the tab. Located to the right is the quantity button which takes in the amount needed of a certain item in the inventory. Add this selection to your cart and continue until every item needed is in the cart. Then press the submit button to submit the request. On the right column is a list of inventory from the database. As items are added to the cart, the quantity of these things are reduced.

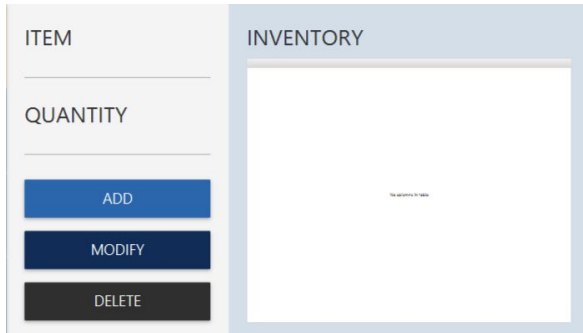
### Section 2: Manage Requests

The screenshot shows a web interface for managing requests. It is divided into two main sections: 'OPEN REQUESTS' and 'CLOSED REQUESTS'. Each section has a table with 'REQUEST DETAILS' and a table with 'REQUEST DETAILS'. To the right of the 'OPEN REQUESTS' section are three buttons: 'UPDATE', 'COMPLETE', and 'DELETE'. The 'CLOSED REQUESTS' section is highlighted with a blue background.

In this tab, the user can see a list of not yet completed requests on top and a list of completed requests on the bottom. Clicking on a request will populate the table to the right with cart info that displays a list of the inventory items in a cart.

Click on an open request to assign an employee to the request. Click update to apply this change. Click complete to add the element to the closed list. Click delete to delete a request from the open list.

### Section 3: Manage Inventory



ITEM

QUANTITY

ADD

MODIFY

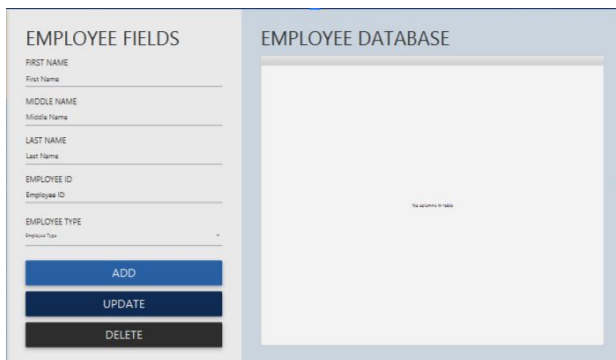
DELETE

INVENTORY

No inventory to show

In this tab, the user can see a list of the hospital's inventory and can add, modify, or delete inventory. NOTE: Adding an inventory item already in the database won't create a new inventory item; it will update the quantity of said item.

### Section 4: Manage Employees



EMPLOYEE FIELDS

FIRST NAME

MIDDLE NAME

LAST NAME

EMPLOYEE ID

EMPLOYEE TYPE

ADD

UPDATE

DELETE

EMPLOYEE DATABASE

No employees to show

In this tab, the user can manage the employees in the system. The employee database is displayed on the right and employees can be added, modified, or deleted from that database.