DSNY SMART System

Container Wireframes

Proposed FINAL May 17, 2013
2-Monitor Solution

Individual Monitor Resolution: 1920x1080

Upon successful login the user is presented with the District Operations Board. The Board can be displayed across one or two monitors. This solution has a minimum monitor configuration of two 24-inch monitors, each at a resolution of 1920x1080, ganged together side by side. This solution is optimized to not contain any scrolling. Any use of equipment that does not satisfy the minimum equipment or browser requirements will necessitate scrolling.

Default SMART System display is across two 1920x1080 monitors. Upon launching application, user must manually stretch browser window to accommodate to full size of both monitors.

Default browsers are IE 9 and FF 20 running on Windows 7. The only browser elements that will display are the browser edge (containing minimize, maximize and close buttons), the URL/task/tabs bar and the navigation bar.

Global navigation bar, containing: DSNY logo, Welcome 'Username', Name of the user’s Boro/Org/District, Board Name, Saved as Time/Date stamp, Realtime Shortage/Surplus numbers, Logout, Submit to Boro, Snapshot Plan, Publish to Display Board, Global Search, Settings, View Targets/Quotas Toggle, and Calendaring/Plans function. See global navigation Task wireframes for detailed layout and functional descriptions. There will be a visual indicator as to whether the user is viewing the live, production or training version of the Board.

Windows 7 task bar will default display and user can auto-hide it if desired.
1-Monitor Solution
Monitor Resolution: 1920x1080

User can change to view SMART across one monitor by accessing the Settings button.

1. SMART System display across one 1920x1080 monitor, in the situation where only one monitor is available for viewing. Upon launching application, user must manually stretch browser window to accommodate to full size of the monitor.

2. Default browsers are IE 9 and FF 20 running on Windows 7. The only browser elements that will display are the browser edge (containing minimize, maximize and close buttons), the URL/task/tabs bar and the navigation bar.

3. Global navigation bar, containing: DSNY logo, Welcome Username, Name of the user’s Boro/Org/District, Board Name, Saved as Time/Date stamp, Realtime Shortage/Surplus numbers, Logout, Submit to Boro, Snapshot Plan, Publish to Display Board, Settings, and Calendaring/Plans function.

4. Application default launches with Personnel and Task panels displayed. User is then also presented tabs for Equipment and Targets/Quotas panels, collapsed to the left side of the screen. User can click on a tab, which will open that panel to the space allocated by the Personnel panel and close the Personnel panel to a leftside tab. Of the Targets/Quotas, Equipment and Personnel panels, only one panel may be open at a time.

5. Vertical scroll bars will be allowed to appear in panels where the data extends beyond the bottom of the screen.

6. Windows 7 task bar will default display and user can auto-hide it if desired.
Panel Interaction Behavior
2-Monitor Solution, Left Monitor Only

In Scenario A, User can toggle open/close the Targets/Quotas panel by selecting the global navigation toggle. Panel appears overlaying the Global Navigation bar.

In Scenario B, if user double-clicks on an item in the Personnel panel that requires viewing the Personnel Detail sub-panel, that sub-panel will appear to the left of the Personnel panel, extended to its full size. User will then be permitted to interact with the functionality on the Personnel Details sub-panel. To close the panel, User is only presented with buttons to either save changes on the panel or close without saving.

In Scenario B, if user double-clicks an item in the Equipment panel that requires viewing the Equipment Detail sub-panel, that sub-panel will appear to the right of the Equipment panel, extended to its full size. User will then be permitted to interact with the functionality on the Equipment Details sub-panel. To close the panel, User is only presented with buttons to either save changes on the panel or close without saving.
Drag and Drop Rules

Release 1 Solution

Users are able, within certain limitations for Release 1, to drag and drop Equipment and Personnel elements between different parts of the Operations Board, in order to assign Equipment and Personnel to tasks.

1. Users can drag an Equipment object from the Equipment panel into an 'empty' task slot for a piece of Equipment on the Task panel. Users can also drag a Personnel object from the Personnel panel into an 'empty' task slot for a Person on the Task Panel.

The system will validate whether the 'empty' slot can accept the type of object (Equipment -> Equipment slot or Personnel -> Personnel slot) that is being dragged into it and snap it into place if it is a match.

2. The system will not allow the user to drag an object into a slot that does not accept that type of object. If the user releases the mouse with an incorrect object over an accepting slot, the object will 'snap' back to its originating area on its respective panel.

3. The system will allow the user to drag additional objects into appropriately accepting fields that already contain an assigned object. When this happens, the system will create an additional 'empty' row to hold the dragged object, and snap the object into the next available slot. There is no upper limit to the number of additional objects that can be assigned to a task.

4. Objects may not be dragged and dropped between status positions within the Personnel or Equipment panels. Any status change of an object, and hence its movement from one area to another within these panels, is generated only by the object's assignment on a district or boro Task board or a change in its details sub-panel.

5. Snapped objects within the Task panel may be dragged to another Task assignment on the Task panel. System will check to ensure slot can properly receive object or else will generate an error (1.0.4)

6. User can remove a snapped object from an assignment by right clicking on the object and selecting 'Remove from Task.' The object is then sent back to its originating panel to its appropriate status, and the slot is 'emptied,' allowing another object to be dragged into it. If the object to be removed is taking up a slot that was created as part of Note 3, then the slot is deleted as well.
Upon rollover of an equipment or personnel object in their respective panel, an associated box appears with critical information about that object. See Personnel and Equipment wireframes for exact content fields.

1. In the Equipment panel, when user rolls over an equipment object, the rollover detail sub-panel appears to the right of the Equipment panel, flush up against the panel, vertically centered along the same horizontal line as the center of the rollover object. Upon roll-off, the sub-panel disappears. If the user double-clicks on the object, the sub-panel also disappears as the Equipment Details sub-panel opens.

2. If the object that is being rolled over is in a different column, the rollover detail sub-panel still appears directly to that object’s right, flush left up against the Equipment panel.

3. In the Personnel panel, when user rolls over a personnel object, the rollover detail sub-panel appears to the left of the Personnel panel, flush up against the panel, vertically centered along the same horizontal line as the center of the rollover object. Upon roll-off, the sub-panel disappears. If the user double-clicks on the object, the sub-panel also disappears before opening the Personnel Details sub-panel.

If the object that is being rolled over is in a different column, the rollover detail sub-panel still appears directly to that object’s left, flush left up against the Personnel panel.
Main Navigation Bar

DSNY Logo and Application Title/Logo

Board information. Displays <Organization>/Shop Name>: <Board Title> (if named). Active board is labeled 'Active Board' in place of Snapshot State. Also displays Board Date and last auto-save time in 24hr time. If Board has no Board Title, Naming Icon displays. User may click on the icon to reveal naming field to add Board Title, upon which icon disappears. There is one unique name per Board (all states) per day per District. User can re-edit name by clicking in field. Deleting name entirely brings back icon. User can edit Board Title in all editable Board states.

Welcome message. Displays as 'Welcome, [First Name] [Last Name]'.

Logout button. Selecting takes user back to login page.

Quotas Toggle Button. Selecting button opens/closes Quotas area of board. See wireframe 1.0.4 for details.

Settings toggle button. Opens/closes settings area. See wireframe 1.0.4 for details.

Create New Blank Board modal toggle button. Selecting button reveals input field to enter date, as well as system calendar picker. User clicks 'Create' to create board and new blank board is opened in new tab. If a board already exists for that date, an error is generated.

Find Module. See wireframes 1.0.5-1.0.6 for details.

Snapshot As modal toggle button. Allows user to take snapshot of the active board and assign a state to it. User chooses radio button and then 'take snapshot' which then closes the toggle button. User can also close toggle button without performing action.

For a District level shop only: Submit to Boro modal toggle button. Above button is message with the state name that can next be submitted to the Boro. When District's Boro submits its Rollup Board to HQ, that action dynamically changes the message, as well as locking previous board states from being submitted. User chooses radio button and then 'submit' which then closes the toggle button. User can also close toggle button without performing action.

For a District level shop only: Publish to Display Board modal toggle button. Above button is message with the board that is currently displaying on the Display Board. Upon clicking this button user is presented with radio buttons of the board currently being displayed (default), as well as a list of available board states for the current board that can be sent to the display board. User chooses radio button and then 'display' which then closes the toggle button. User can also close toggle button without performing action.

Live Summary Surplus/Deficit area. See Summary wireframe for details.
### 1.0Q Quotas Panel

**Annotations**

1. When User clicks on Quotas toggle button, the Quotas Panel appears completely and directly over the entire Main Navigation Panel in the left monitor. User can close panel by untoggling the Quotas button. Shows Quota for the date of the Board.

2. Quotas button changes state to indicate that Quotas Panel is open.

3. Panel Title includes Shop Name and Date.

4. Column is a unique Category-Subcategory combination. Columns are listed alphabetically by Category-Subcategory combinations (all Cleanings, then All Collections, All Recyclings, etc.). For Release 1 system should target 15 columns max.

#### QUOTAS: BKN01- MONDAY, JULY 15

<table>
<thead>
<tr>
<th>Quota Shift 1</th>
<th>Category Sub-Category 1</th>
<th>Category Sub-Category 2</th>
<th>Category Sub-Category 3</th>
<th>Category Sub-Category 4</th>
<th>Category Sub-Category 5</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
<tr>
<td>Quota Shift 2</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
<tr>
<td></td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
<tr>
<td>Quota Shift 3</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
<tr>
<td></td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
<tr>
<td>Total</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
<td>#</td>
</tr>
</tbody>
</table>

User depresses toggle button from right monitor and Panel appears over Main Nav area in left monitor.
1.0.1 Task Details

When User clicks on a Task Name or the title of the container, the modal Task Details Panel appears directly over and vertically and horizontally centered over the entire Main Navigation Panel in the right monitor. User must interact with the Panel to dismiss it and return to the underlying screen. Shows all tasks for the container clicked. Each task is reported on a separate row.

1. Title of Panel lists Task Details: <Shift>/<Category>/<Sub-Category>/<Section> (if any)
2. Start and end time default to the start and end of the shift date and time. User can type directly into these fields to edit. System accepts 0000 24 hour time or 00:00 from user and will truncate the colon. Start and end date cannot be more than 1 day apart.
3. Dropdowns to select supervisors. Any task may have no more than 2 supervisors. Default starts with both dropdowns as ‘No Assignment’.
4. When User drops a Supervisor Personnel Object onto the task name (or a Section or Category/Sub-Category header) of Task Panel this Supervisor name populates the first drop down dynamically. If the User drops a second Supervisor onto the task, and if the second dropdown has ‘No Assignment’, then the second supervisor fills the first dropdown and old first supervisor becomes #2. As User drops additional supervisors onto the Task, they are loaded into the dropdowns as Last In, Highest Name. All names, plus ‘No Assignment’ will then appear in the dropdown. If user attempts to assign the same supervisor to both dropdowns, an error is generated. (See 1.0.2x)
5. Comments field. Defaults to ‘Enter Comments’ instructional text. When user clicks in this field, instructional text disappears and user can enter free form text.
6. Equipment/Personnel details. Displays each piece of the equipment for the task, as well as the personnel assigned to that equipment. If no equipment or personnel are assigned these fields are blank. The equipment label is a hyperlink to its Carting Book in Peoplesoft, which launches in a new tab. It is assumed that the first Personnel name to the right of the equipment ID is that equipment’s driver. Additional rows are added for extra equipment or personnel added to the task. Date and time default to the shift’s start and end date and time. User can also edit date and time fields similar to Note 2.
7. Partial Route selector. Defaults to ‘None’. User can select 1/8, ¼, 3/8, ½, 5/8, ¾ or 7/8. If user selects a partial route, the ‘From’ and ‘To’ fields dynamically appear, allowing user the ability to enter free form text to indicate destinations. Field content then displays on display board (max characters = 7). Panel size expands to accommodate.
8. If the container holds more than one task, the task is displayed in a separate section.

Selecting Cancel cancels the editing process, abandons any changes and dismisses the panel. Selecting Save Details validates all changes made by the user. Invalid data generates an error message (see 1.0.2x). If successful, field values are saved and the panel is dismissed.
1.0.2x Task Panel System Messages and Error States

1. This Board’s tasks have not been started. Please go to Settings to specify Shifts, Categories, Sub-Categories, and Sections.

2. Are you sure you want to delete this Task?
   - Yes
   - No

3. Invalid data. Please correct the highlighted fields.
   - OK

System message appears inside the Task Panel when there are no containers selected in the Settings Panel.

Message appears when the User right clicks on a Task Name and selects ‘Delete Task’.

Message appears when user selects Save Details from the Task Details panel and has entered invalid data in a field. The underlying field is also highlighted.
1.0.3/1.0.3.1 Update Load Status and Error Message

The following equipment may require updates to its Load Status. The current status is shown. Please provide any updates.

<table>
<thead>
<tr>
<th>Date/Shift</th>
<th>Equipment ID</th>
<th>Task</th>
<th>Current Status: Load 1/Load 2</th>
<th>Update Load 1</th>
<th>Update Load 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mo 06/12/13 06:00–14:00</td>
<td>25DC201</td>
<td>Cat Name/Sub-Cat Name</td>
<td>Empty/Relay</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mo 06/12/13 08:00–16:00</td>
<td>25DC202</td>
<td>Lorem Ipsum/Ipsum</td>
<td>Empty</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tu 06/13/13 23:00–07:00</td>
<td>25DC203</td>
<td>Lorem Ipsum/Ipsum Sequent</td>
<td>Rollover/Rollover</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1. User accesses Update Load Status dialog box by selecting Update Load Status button from Equipment Panel. Modal dialog box appears on top of the Task Panel centered vertically and horizontally.

2. User must explicitly dismiss box by saving or cancelling in order to return to the Task Panel.

3. Dialog box provides list of all Equipment whose Load Status violates the time error: (Current Time > Task End Time) + (Load Status Last Update Time < Task End Time). List is order chronologically by date/shift start time, then by Equipment ID. Each entry shows date/shift time, Equipment ID, Task Category/Sub-Category assignment, current Load Status.

4. If an Equipment object has only 1 load, then only 1 load is displayed here and no dropdowns are provided in the Update Load 2 fields.

5. User is provided dropdowns to Update Loads 1 and 2. Dropdowns default to 'select status'.

6. Selecting Relay or Rollover status requires a Material Type. If user selects Relay or Rollover status, user must select a material type.

7. Selecting Cancel returns user to the Task Panel with no changes committed. Selecting Update causes system to validate data. If no Material Type is selected for a Relay or Rollover status an error message is provided and the appropriate field is highlighted in red (see note 6). If data passes validation, changes are committed to the system, dialog box is closed, load status icons are updated in the Equipment Panel for the respective equipment object and load details and last update time are updated in the respective equipment objects Equipment Details screen. If user does not update a particular status then selecting 'update' keeps the old status and status time.

8. Modal Error message that is provided if user does not select a Material Type when a load is selected as Relay or Rollover. User must explicitly click OK to dismiss and then will be taken back to the underlying dialog box to fix the error.

Error State
1.0.4 Task Settings

Default State

Interaction Steps

Step 1

Step 2

Steps 3 & 4

Other Scenarios

1.0.4 Main Navigation - Task Settings - Page 7 of 11

Annotations:

User configures task container through settings drawer, which is accessed by clicking on the Settings toggle button in the Main Navigation bar. User here selects which nodes and leafs of the container tree they wish to display task boxes for. User selects checkboxes until his desired nodes all turn green. When user closes drawer by unselecting Settings Toggle, new nodes applied to the Task panel. Only valid settings are remembered when user re-opens drawer.

Main interaction pathway. In Step 1, user selects a shift by selecting its respective checkbox. Upon this action, the Shift become red because it it not a complete valid container selection, and additional boxes representing all possible Categories for that Shift are displayed directly below. Each Category defaults to grey and contains its own checkbox, which defaults to unselected. In the event user selects too many Category/sub-Categories for the column, a scroll bar will appear. If user unselects nodes that currently have tasks on their board, an Are You Sure error message will be displayed (see note 12). Process is same if user tries to dynamically move upwards. If tasks exist on their current board, an Are You Sure error message is displayed (see note 12a). User must acknowledge this error before continuing. If user selects ‘Yes’ then changes will be committed as if the task had been deleted; if they select ‘No’ their uncheck action will be reversed.

As user selects Settings Toggle button, modal Settings Drawer displays directly under the Main Navigation bar, overlaying the Equipment & Personnel Panels. Default state of drawer on a new board contains boxes representing each possible shift time. Each box contains a checkbox allowing user to select a shift. All boxes default to inactive (grey) and all checkboxes default unselected.

If a Sub-Category that had been selected is deselected, then its label turns back to red when no Sub-Category is selected. In Step 2, user selects a Category by selecting a checkbox. Upon this action, the Category becomes red and a list box containing all possible Sub-Categories for that Category are displayed directly below, alphabetically. Each Sub-Category defaults to grey and contains its own checkbox, which defaults to unselected.

When selecting a Sub-Category (but no section) is the requirement for creating a valid task container, all leafs and branches of the successful pathway are now displayed in green, while invalid selected partial pathways remain displayed in red. User can select more than one Section per Sub-Category. If user selects a Sub-Category by selecting a checkbox. Upon this action, the Sub-Category header plus additional boxes containing all possible Sections for that Sub-Category are displayed directly below. If a Sub-Category contains no sections (i.e. Support Sub-Categories) the Section boxes do not display. Each Section defaults to grey and contains its own checkbox, which defaults to unselected.

Because a Category node requires a Sub-Category to be valid, Category remains in grey when no Sub-Category is selected. If a Sub-Category that had been selected is deselected, then its label turns back to red when no Sub-Category is selected. If user tries to unselect a previously selected Category, which will remove all Sub-Categories and Sections contained within it.

User can select more than one Section per Sub-Category. When user clicks close drawer by selecting Setting toggle, nodes choices are applied to the Board. If user attempts to close drawer without selecting a valid node combination, an error message is displayed (3.0.2a). User must acknowledge and is taken back to the open drawer to fix choices. If user unselects nodes that currently have assigned tasks for them on the current board, an Are You Sure error message will be displayed (3.0.2). If user selects ‘Yes’ then changes will be committed as if the task had been deleted; if they select ‘No’ their unselect action will be reversed.

If a Sub-Category that had been selected is deselected, then its label turns back to red when no Sub-Category is selected.
1.0.5 Find Module: Equipment and Personnel Search

### Default States

- **Equipment 'Filter' State**
  - Term is: Equipment ID
  - Instruction Lorem Ipsum

- **Personnel 'Filter' State**
  - Term is: Employee Name
  - Instruction Lorem Ipsum

### Equipment 'Filter' State

- **Show me only results with:**
  - Equipment Category (Any Plow: No Plow, Plow-Large V)
  - Bin Status (Dressable, Emergency Response)
  - License Plate
  - Down Code

### Personnel 'Filter' State

- **Show me only results with:**
  - Civil Service Title (Boro Office 12-8 (BO), Field Officer 4 (F4))
  - Attached
  - Special Position
  - Officer Position
  - Qualification
  - MDA

### Find Module

- User can find Equipment by clicking on the 'Equipment' tab.
- User can find Personnel by clicking on the 'Personnel' tab.

### Other Boards

- **Add Criteria >**
  - Criteria 2
  - Criteria 3

### Instructions

- **Instruction text** tells user the allowable type of entries into the find field.
- **Instruction text prompt** will change accordingly.
- **Instruction text** will interpret the search string by selecting a type from the dropdown.

### Annotations

- **Default state for the Find module shows entry field, tab type to indicate what the find object is, 'filter' icon appears only when Equipment and Personnel tabs are active, Term Identifier dropdown, text prompt suggesting to user the query format, and 'go' button.**
- **Default find category is Equipment by Equipment ID.**

- **User can find Personnel by clicking on the 'Personnel' tab. Instruction text prompt will change accordingly. Default find category is for Personnel by Personnel Last Name.**

- **For Equipment or Personnel search, user can select how the system will interpret the search string by selecting a type from the dropdown. Changing the type dropdown will change the instruction prompt message in the entry field to provide user with proper entry format.**

- **Instruction text** tells user the allowable type of entries into the find field.

- **Clicking on magnifying glass icon performs the query. If cursor is still within the entry field, user may also hit return on his keyboard to execute the search. See separate wireframe for description of results and display.**

- **If no results exist, an error message (1.0.4) is displayed.**

- **For Equipment and Personnel only: clicking on the filter icon deactivates the main find entry field and opens the filter drawer directly below the navigation bar requiring user to search from the open drawer. Filter icon changes state to indicate that drawer is open. Filter will use search term in the upper box as an additional criteria unless user explicitly leaves this box empty.**

- **User can choose to filter the search result set by a series of category and sub-categories. User selects the category from the list on the left. List on the right then dynamically changes to display sub-categories for that category. User can then select a sub-category. See Functional Specifications document for Category and Sub-Category lists and display order. Defaults to unsellected.**

- **To add a filter criterium, the user clicks the ‘Add Criteria’ button. The selected sub-category name will then fill one of the 3 available empty slots with the sub-category name. User is allowed to apply a maximum of 3 filter criteria. Multiple applied criteria returns an intersection of search results. User can remove criterium by clicking on the ‘X’ button next to the criteria, which then removes the slot to its empty state. User must explicitly click on the magnifying glass to perform the search, adding or deleting criteria will not dynamically re-run the search.**

- **User is provided a ‘go’ button within the filter drawer. Clicking on the button performs the search query, closes the advanced drawer and displays search results (see separate wireframe).**
1.0.5 Find Module: Equipment & Personnel Search Results

- Only result items will display and change state
- Equipment and Personnel searches can display simultaneously
- Items will re-order according to sort rules of the respective panel
- Numerical total of each sub-category will reflect number of search results

Post-Query State:

![Diagram showing search results display and user-entered search string]
1.0.6 Find Module: Other Boards

Find Module – Other Boards. User searches for other boards via the Other Boards tab of the Find module in the Main Navigation bar. User enters a set of date and/or name criteria and receives back a result set of Boards. User can then choose a board plus its snapshot state and then view, edit or copy the board to another date.

1. User must enter a date range. Both date boxes default to blank with instruction text. User can type in field or use the system calendar date picker.
2. User can enter an optional Board name. System will interpret entry as a string and add this as a filter criteria to the selected date range.
3. Selecting the magnifying glass icon performs the search. Result set is displayed as a modal drawer directly underneath the Board Search Module, overlaying the Task Panel. User must finish interaction with the module before he can return to the Task Panel. System performs data validation and shows error message if date range is invalid or no board match criteria.
4. Upon executing search and opening drawer, magnifying glass turns into an ‘X’ button, which user can click in order to change his search criteria or close the drawer and return to the Task Panel.
5. Board Search Results. Result set is given in a modal sub-panel, with a table listing Board Date, Board Name and a Board State dropdown, where users can pick a particular snapshot state (as well as Active Board). Each line is accompanied by a radio button. All radio buttons default to unselected. Board State dropdown defaults to Active Board. Table is sorted chronologically by date. Scroll bar may appear if the results set is taller than the sub-panel.
6. Action buttons; based on which board a user selects, he can perform various actions on it. Selecting View Board opens the selected board as a new tab in view only mode. Selecting Edit Board opens the selected board as a new tab, allowing users to make edits. User can edit only active boards and Edit button is greyed out for all other board state selections. Editing a historic active board also autosaves changes to its Final Utilization snapshot. Selecting Copy, after providing a date, copies the task settings of the selected board to the selected date in a new tab. User can only copy a board to a current or future date. Error messages are provided if invalid criteria is provided.
Main Navigation Bar: Live Summary Module

<table>
<thead>
<tr>
<th>Equipment</th>
<th>Personnel</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rear Loader + Alley</td>
<td>#</td>
</tr>
<tr>
<td>Dual Bin</td>
<td>#</td>
</tr>
<tr>
<td>Mech Br</td>
<td>#</td>
</tr>
<tr>
<td>Available</td>
<td>#</td>
</tr>
<tr>
<td>Needed/Quota +/-</td>
<td>#</td>
</tr>
</tbody>
</table>

1. Date/Time stamp is pushed to board and indicates freshness of data.
2. Live equipment surplus/deficit area. Separate areas for Rear Loaders + Alley Trucks, Dual Bin Trucks and Mechanical Broom. See Use Case for formulas to calculate values.
3. Live personnel surplus/deficit area. See Use Case for formulas to calculate values.