



This PDF is generated from authoritative online content, and is provided for convenience only. This PDF cannot be used for legal purposes. For authoritative understanding of what is and is not supported, always use the online content. To copy code samples, always use the online content.

Workforce Management Web for Supervisors (Classic) Help

[Schedule Build Wizard](#)

Contents

- 1 Using the Schedule Build Wizard
- 2 Building schedules
- 3 Select sites (and build options)
 - 3.1 Site
 - 3.2 Force single skill
 - 3.3 Shuffle agents
 - 3.4 Use team constraints
 - 3.5 Use shared transport constraints
 - 3.6 Exclude granted agents from used constraints
 - 3.7 Use secondary activities
- 4 Schedule build parameters
 - 4.1 Team synchronicity
 - 4.2 Shared transport constraints
 - 4.3 Preference fulfillment options
 - 4.4 Optimize profiles
 - 4.5 Assign profiles to teams
- 5 Scenario Building Schedule dialog


Use the wizard to build schedules for selected sites, based on selected forecast scenarios that include all activities and agents defined for those sites.

Related documentation:

-

Using the Schedule Build Wizard

To use the wizard:

1. Select an existing schedule scenario or use the New Schedule Scenario Wizard to create a new scenario.
2. Open one of the following Schedule Scenario views:
 - Scenario Intra-Day
 - Scenario Agent-Extended
 - Scenario Coverage
 - Scenario Weekly
 - Scenario Profiles/Bidding
 - Scenario Summary
 - State Group Totals
3. Click the **Build Schedule** button () in the **Actions** toolbar, or select **Build Schedule** from the **Actions** menu.
The Select Sites screen opens.
4. Select the site(s) and build options that you want, and then click **Next**.
The Schedule Build Parameters screen opens.
5. Select the specific parameters to apply for Team Synchronicity, Shared Transport Constraints, Preference Fulfillment Options, Optimizing Profiles, and Assigning Profiles to Teams.
6. Click **Finish**.
The Building Schedule... dialog appears, showing the progress of schedule building.

Building schedules

The **Building Schedule** dialog appears after you click **Finish** in the **Schedule Build Wizard**. This dialog displays the schedule building progress and basic information about the built schedule scenario.

The **Schedule Information** section, contains information about the schedule, such as the sites that are included in this build, the number of days in the schedule scenario, the number of agents, and the schedule start date.

The **Build Progress** section contains status information, such as the start time, the elapsed time, and the **Current Status**, indicating how the build is proceeding. After the schedule is built, the **Current Status** changes to **Done** and you can review any messages that were generated during the schedule building process. The number of messages is displayed in the bottom section of the dialog. Other information in this section includes, the number of iterations of the schedule, the minimum, maximum, and probable **Agent Count Range** used in this schedule build.

Clicking the one of three buttons in the **Building Schedule** dialog enables you to take the following actions:

- **Review Messages**—Opens the Review Messages dialog. Enabled only if schedule building caused messages to be generated.
- **Stop and Save**—Enabled only if **Optimize Profiles** is selected after the application builds the first valid schedule (see Schedule build parameters). The application sometimes continues to build additional schedules to create an optimal schedule. To speed up the schedule building process, you can interrupt this process and save the latest results. However, this can result in schedules that are less optimal.
- **Close**—Closes the **Building Schedule** dialog.

Select sites (and build options)

Use the **Select Site** screen in the **Schedule Build Wizard** to select one or more sites, and specific schedule build options for each site.

This screen displays a table, with a separate row for each available site. Within each row are columns that contain build options.

- Choose all items in any column by selecting the check box at the top of the column. Clear the check box to reject all items.
- Choose any individual item in any row by selecting the check box in that row. Clear the check box to reject that item.

The columns contain the build options described below.

Site

Each row contains a site that is in the currently selected schedule scenario. You must select at least one site.

If you do not see a site that you want to include, cancel and create a new schedule scenario that contains that site, and then use that site as the basis for your schedule build.

Force single skill

If you select this option and an agent has multiple skills, the agent can be scheduled for only one activity on each workday.

If you clear this option, the agent can be scheduled for multiple activities on the same day.

Use required

If you select this option, the schedule is built with the Required Staffing forecast, not with the Calculated Staffing forecast.

Disable monthly constraints for the first month

Select this check box when the first month is not complete (because you are scheduling from the middle of the month) and there is no historical data for the beginning of the month. In this situation, schedule building cannot correctly accommodate monthly constraints, such as minimum or maximum work hours per month.

Select this check box to relax those constraints for this month.

Shuffle agents

If you select this option, the agent pool is *randomized* before scheduling. (*Randomizing* ensures that the schedule's results are independent of the sequence in which agents are loaded into the scheduling algorithm.)

Use team constraints

Select this check box to enable team synchronicity constraints in the next wizard screen (**Specify Build Parameters**). Clear the check box to disable this functionality.

This option and the **Use Shared Transport Constraints** option cannot be selected simultaneously.

Use shared transport constraints

Select this option to enable shared transport group constraints in the next (**Specify Build Parameters**) wizard screen. Clear the check box to disable this functionality.

This option and the **Use Team Constraints** option cannot be selected simultaneously.

Tip

Shared Transport is known by many different names worldwide—bus, carpool, ride share, lift share, and paratransit, for example. See Wikipedia for details.

Exclude granted agents from used constraints

If you select this option, agents who have been granted full-day exceptions or working hours are not considered when team synchronization is enforced.

Important

Always select this option when you are using team constraints.

Click **Next** to continue, or **Cancel** to discard your selections and close the wizard.

Use secondary activities

Check this option to assign a secondary activity to agents directly. Activity assignment is based on skills and skill levels, therefore a secondary activity is one, in which at least one of the agent's skills is marked as secondary. Leave this option unchecked if you want only primary activities considered in the Site schedule scenario.

Schedule build parameters

Use this screen in the **Schedule Build Wizard** to select parameters for the selected sites from the previous screen.

Each site is a node in a tree on the left-hand side of the screen. Click the node to open the tree and display that site's build parameters. Select a parameter in the tree (on the left,) and you can select, specify, or disable all of its options on the right side of the screen.

The parameter categories are:

- Team Synchronicity
- Shared Transport Constraints
- Preference Fulfillment Options
- Optimize Profiles
- Assign Profiles to Teams

Team synchronicity

Specify these parameters:

Synchronize Days Off	Select this check box to specify that days off should be synchronized for all teams.
Synchronize By	Use the radio buttons to specify the synchronization combinations to apply when

	<p>building the schedule:</p> <ul style="list-style-type: none"> • No additional synchronization • Shift Start Time—If checked, use the duration control Maximum Start Time Difference to specify the maximum difference between shift start times inside the team. Use the format HH:MM; where 02:59 is two hours and fifty-nine minutes. • Paid Duration • Shift Start Time and Paid Duration • Shift Start Time, Paid Duration, and Meals • Shift Start Time, Paid Duration, Meals and Breaks • Paid Duration and Meals • Paid Duration, Meals and Breaks
Maximum Start Time Difference	Specify in hh:mm format. Range is from 0 (zero) to 23:59.
Apply constraints only to the same contracts inside team	Select this check box to specify that while synchronizing teams, WFM must take configured contract information into account while creating the schedule. By default, this check box is cleared.

Tip

Synchronization applies to all teams under the selected site.

Shared transport constraints

Tip

Shared Transport is known by many different names worldwide—bus, carpool, rideshare, lift-share, and paratransit, for example. See Wikipedia for details.

If you selected **Shared Transport Constraints** in the Select sites (and build options) dialog box, this selection is enabled and **Team Synchronicity** is disabled (team and shared transport group restraints are mutually exclusive). Type, or use the spinner controls, to specify the maximum deviation between starts and ends of shifts. You can specify any value between 1 minute and 23 hours, 59 minutes; most practical values will be less than 30 minutes.

Important

The participants in a shared transport group can work in shifts that begin and end at different times; however, they should not deviate greatly, or the shared transport group becomes impractical. You are specifying the maximum allowable deviation in the schedule of each participant in the same shared transport group.

Preference fulfillment options

The **Force Maximum Preference Fulfillment** parameter optimizes the number of profiles for the selected site. See [How the preference fulfillment ratio works](#) for more information.

Select this parameter to:

- Treat all preferences with preferred status as granted.
- Resolve all granted and would-be granted preferences.
- Use the result to build the schedule.
- Disable all other options on the page.

Clear this parameter (default) to disable the options listed above, and enable the options listed below.

Prioritization	<p>Specifies how WFM Builder favors agent requests when building the schedule. Select one item from the drop-down list:</p> <ul style="list-style-type: none">• None specifies no prioritization during schedule building.• Seniority favors agents by their hire dates (which are indicated in the table on the lower part of the Preference Fulfillment screen).• Rank favors agents by their rank, as defined by a supervisor in the Agent properties (and also indicated in the table on the lower part of the Preference Fulfillment screen).• Seniority + Rank favors agents by Seniority first, and if that results in a tie, then uses Rank as the criterion.	
Emphasis	Controls how closely the build	

	<p>process considers skill coverage when it assigns priorities to preferences. Select one item from the drop-down list:</p> <ul style="list-style-type: none"> • None specifies that agents' preferences are assigned on the basis of seniority and/or rank alone, using the percentages assigned to the agents (as shown in the % column). This option tends to favor multi-skilled optimization over preference fulfillment. • Low specifies that schedule building places more emphasis on preference fulfillment, without sacrificing multiskilled optimization. • Medium specifies that schedule building accommodates preferences if a loss in any skill coverage is caused only by an exception. • Strong specifies that schedule building does not consider multiskilled optimization when it allocates preferences. <div style="border: 1px solid #ccc; background-color: #e6f2ff; padding: 5px; margin-top: 10px;"> <p>Tip Emphasis is disabled when you select Team Constraints in the Select sites (and build options) wizard page.</p> </div>	
<p>Fulfillment</p>	<p>Sets the minimum and maximum percentage of preferences that schedule building fulfills. For example, if you set Min to 10% and Max to 80%, every agent has at least 10% of his or her preferences fulfilled, while the highest-ranking or most senior agent has at least 80% of his or her preferences fulfilled. Agents with intermediate standing receive a percentage between the two extremes (their exact percentage depends on their place in the hierarchy).</p> <p>Enter or select the Min(imum) and Max(imum) values. The range is 0—100</p>	<p>2</p>

	<p>and Min. must be lower than Max.</p> <div style="border: 1px solid orange; padding: 5px;"> <p>Important</p> <p>Schedule building applies these percentage values separately to each preference type and satisfies all preferences, when possible. For example, if an agent has a 50% fulfillment ratio, and makes 20 shift preferences and 8 day-off preferences over a 4-week period, the agent is guaranteed to receive at least 10 preferred shifts and 4 preferred days off, unless this preference fulfillment is prohibited by other working rules.</p> <p>In cases where the preference fulfillment ratio cannot be achieved due to working-rule violations, WFM Web displays a warning indicating that the schedule results may not be desirable. WFM Web attempts to satisfy more than the minimum level of preference fulfillment, as long as the results do not cause understaffing.</p> </div>	
Calculate	<p>Calculate</p> <p>Re-sorts the table below by the % column, which will then display each agent's calculated chance of preference fulfillment. (Use the table's vertical scroll bar to display more agents.)</p> <ul style="list-style-type: none"> • Click Calculate. 	
Adjust Fulfillment Ratio	<p>Adjusts the preference fulfillment ratio using the controls below the table.</p> <ol style="list-style-type: none"> 1. In the Adjust Fulfillment Ratio text box, enter a value or use the up or down arrows to modify the displayed value. Range is -100 to +100. 2. Click Adjust. <div style="border: 1px solid lightblue; padding: 5px;"> <p>Tip</p> <p>In the % column, WFM Web adds your adjustment to or subtracts it from, all agents' chances of preference fulfillment. However, it does not increase any agent's fulfillment ratio above 100% or reduce it below 0%.</p> </div>	

How the preference fulfillment ratio works

The preference fulfillment ratio modifies the impact of the agent prioritization settings.

- The preference fulfillment functionality applies only to calendar items that an agent can request (Shift, Day Off, and Availability). Also, these items may be inserted into the calendar by a supervisor. Any other preferred calendar items (such as Exceptions, Times Off, Working Hours) are not fulfilled; they remain in Preferred status even if 100% fulfillment is defined.

- If you set the ratio to a value greater than 0, then each agent's chances of having his or her preferences fulfilled is increased by whatever value you entered, up to the maximum percentage that you set for the **Max** option.
- If you set the ratio to a value less than 0, then every agent's preference fulfillment ratio is reduced by whatever value you entered, down to the minimum percentage that you set for the **Min** option.

Tip

The preference fulfillment ratio cannot surpass the **Min** and **Max** percentage values set under **Preference Fulfillment Options**. For example, if **Max** is set to 80%, and the preference fulfillment ratio is set to 100 (maximum preference fulfillment), all agents will top out at 80%. If **Max** is set to 80% and **Min** is set to 10%, and the preference fulfillment ratio is set to -30 (favoring optimization), then agents who would be at 80% are dropped to 50%; agents at 40% are dropped to 10%; and all agents with prioritizations lower than 40% also drop to 10%.

Optimize profiles

The grid displays all profiles for the selected site. These are the profiles that are based on configured profiles, not profiles that are based on agents. The columns in this grid are:

Profile	Profile names.
Min	The minimum number of profiles that WFM can use when building the schedule. Range: Empty (default) or any number from 0 to 9999. This value is editable, and must be less than the value of Max .
Max	The maximum number of profiles that WFM can use when building the schedule. Range: Empty (default) or any number from 1 to 9999. This value is editable, and must be greater than the value of Min .
Existing	The number of actual profiles already present in the selected schedule scenario.
Growth Ratio	The current growth ratio value that WFM can use for a particular profile when building the schedule. Range: Empty (default) or any number from 1 to 9999. This value is editable.

To archive specific goals for profiles optimization, the following valid parameters must also be considered:

1. Profiles are excluded from optimization when none of the following are specified: minimum profiles, maximum profiles, or growth ratio. Profiles must be empty.
2. Profiles with a fixed number of agents must have the minimum profiles = maximum profiles, with both values greater than 0. They do not require optimization, growth ratio is not applicable, and growth ratio fields must be empty.
3. Profiles participate in optimization when both minimum and maximum values are specified by following

these rules: minimum profiles must be > or = 0, maximum profiles must be > 0, and minimum profiles must be

4. Growth ratio is specified—All profiles that participate in profile optimization must have a specified growth ratio > 0 (0 is not a valid value for growth ratio).
5. Growth ratio not specified—Must be empty for all profiles.

Important

- You cannot have profiles with growth ratio and without growth ratio in the same schedule. Growth ratio must be specified for all profiles being optimized (see 3a) or none (see 3b). The only exception is in line 1 (above), where profiles are excluded from optimization completely.
- If minimum profiles = 0, it does not mean that a value is not specified. 0 is a valid value for minimum profiles.

Controls

These controls appear at the bottom of the **Optimize Profiles** pane:

Total Growth Ratio	Total of all rows from the grid column Growth Ratio (%) . Not editable.
Show configured profiles check box	Check to limit filter the grid to show only profiles that have Min and Max parameters specified. Default: cleared
Show existing profiles check box	Check to limit filter the grid to show only profiles that are already present in the selected schedule scenario. Grid column Existing cannot contain 0 (zero). Default: cleared
Understaff threshold (%) field	Enter the understaff threshold that WFM must use when building the schedule. Range: 0 (no understaffing) to 100 (total understaffing). Default: 20.

Assign profiles to teams

To assign profiles to teams:

1. Select **Use Backfilling of Existing Teams** to enable this parameter.
2. Enter a number in the **Team Size** field.
The schedule scenario that you are building contains profiles and not actual agents in the selected site.

You can assign profiles to be used to backfill teams that require it. The grid displays all non-profile teams in the selected scenario. For each team, you can select the profile should be used to backfill that team. The grid has these columns:

Team	The team name.
Profile	A drop-down list of possible profile choices: <ul style="list-style-type: none">• None (default)• A list of profiles that corresponds the value of Max on the Optimize Profiles page.

3. Click **Finish** to apply your choices and begin the build.

Scenario Building Schedule dialog

The Building Schedule dialog appears after you click **Finish** in the Schedule Scenario Build Wizard. This dialog displays the schedule building progress and basic information about the built schedule scenario.

The **Schedule Information** section contains information about the schedule, such as the sites that are included in this build, the number of days in the schedule scenario, the number of agents, and the schedule start date.

The **Build Progress** section contains status information, such as the start time, the elapsed time, and the **Current Status**, indicating how the build is proceeding. After the schedule is built, the **Current Status** changes to **Done** and you can review any messages that were generated during the schedule building process. The number of messages is displayed in the bottom section of the dialog. Other information in this section includes the number of iterations of the schedule, the minimum, maximum, and probable **Agent Count Range** used in this schedule build.

Clicking one of the three buttons in the **Building Schedule** dialog enables you to take the following actions:

- **Review Messages**—Opens the Review Messages dialog. Enabled only if schedule building caused messages to be generated.
- **Stop and Save**—Enabled only if **Optimize Profiles** is selected after the application builds the first valid schedule (see Schedule build parameters). The application sometimes continues to build additional schedules to create an optimal schedule. To speed up the schedule building process, you can interrupt this process and save the latest results. However, this can result in schedules that are less optimal.
- **Close**—Closes the **Building Schedule** dialog.