

SWITCH-PROS



SP9100 App Guide

Getting Started.....	2
How to Connect.....	2
Quick Actions.....	3
Configure Switches.....	3
a. “ON/OFF - Momentary”	3
b. “Battery/Ignition”	3
c. “Flash”	3
d. “Strobe”	4
e. “Low Voltage Disconnect”	4
f. “Memory”	4
g. “Master Switch”	4
Set LED Backlighting.....	5
Set Switch Name & Icon.....	5
Set Panel Name.....	5
Set Password.....	5
Enable Output Dimming.....	5
Set Auto Sleep Settings.....	6
External Trigger Set Up.....	6
Temperature Units.....	7
Setup Connected Units.....	7
Power-Up Switch Status.....	7
Off Delay Switch Settings.....	7
Output Overcurrent Values.....	7
SPDT & SP3T Switch Configuration.....	8
Restore Settings to Default Values.....	8
Dual System Connection.....	8
Summary of Programmed Functions.....	8

Getting Started

Apple

1. Launch the App Store → search for *switch-pros* → click “Get”
2. Once installed, locate the app on your home screen and click on it to open
3. Allow ALL Bluetooth, location, etc. permissions

Android

1. Launch the Google Play Store → search for *switch-pros* → click “Install”
2. Once installed, locate the app on your home screen and click on it to open
3. Allow ALL Bluetooth, location, etc. permissions

How to Connect

1. Be sure you are within +/- 50 ft of your switch panel
2. Click “Scan for local devices”
3. A gray box will pop up, and the name of Switch-Pros panel(s) in range will appear
 - a. *If you are connecting for the first time, your panel will be named SWCHPRO. See pg. 2 for instructions on how to change the name*
 - b. *If the app does not show your panel and you are within range, follow the steps below*
 - i. **Allow Permissions**
 1. Apple: *Close the Switch-Pros app and launch your settings app. In your settings, find “Privacy & Security” → “Bluetooth” → be sure Switch-Pros is enabled*
 2. Android: *Close the Switch-Pros app and launch your settings app. In your settings, find “Apps” → find “Switch-Pros” → click “Permissions” → be sure Bluetooth and Location are both allowed*
 3. *If the blue light, in the top center of your switch panel, is illuminated, **prior to connecting**, you will need to unplug the 4-pin communications cable for 30 seconds. After plugging it back in, the blue light will go out, and the device will appear when you Scan for Local Devices again.*
 4. *Once these steps are taken, follow steps 2 & 3 again*
4. Click on the name of your panel to connect and the screen will then show a box with a loading icon
5. Once a virtual panel appears, you have connected successfully

Quick Actions

1. This feature allows the user to operate their accessory with the strobe, flash or dim function as a one-time use, without permanently programming it. The accessory will continue the quick actions function until turned off, then the quick action function will no longer be applied (Ex. Switch 1 is a set of rear-facing pods, used as backup lights. The user needs to stop and is pulled to the side of a dirt road, needing emergency lights on. The user can access the Quick Actions menu and strobe Switch 1, without having to permanently set the strobe feature)
 - a. **Available on systems with SN: 21126378 +*
2. To operate this feature, tap “Quick Actions” on the home screen → tap on the desired switch for the quick action → tap the desired function (strobe, flash, or dim level) → tap the switch icon to activate the output → “Exit”

Configure Switches

1. Settings → “Configure Switches”
 - a. “ON/OFF - Momentary”
 - i. This feature will program the switch to be latching or momentary
Default is On/Off
 - ii. To change the switch to momentary, locate the switch in the left column → tap the corresponding drop-down menu on the right side → select momentary → repeat for all switches desired → “Save”
 - b. “Battery/Ignition”
 - i. This feature determines which system input is needed to turn the switch on from the panel
Default is Ignition
 1. *When connected via Bluetooth, all switches will be operational, whether programmed as battery or ignition*
 - ii. To change the input the switch requires to function, click the dropdown next to the desired switch → click battery/ignition (whichever desired) → “Exit”
 - c. “Flash”
 - i. When ON, the switch must be double-pressed for the flash function to activate. If *One Touch* is selected, the switch will activate this pattern when it is pressed once, from the off position
Default is Off
 - ii. To change a switch to have the flash function, locate the switch in the left column → tap the corresponding drop-down menu on the right side → select the desired flash function (Flash or One-Touch Flash) → repeat for all switches desired → “Save”

- d. “Strobe”
 - i. When ON, the switch must be double-pressed for the strobe function to activate. If *One Touch* is selected, the switch will activate this pattern when it is pressed once, from the off position
Default is Off
 - ii. To change a switch to have the strobe function, locate the switch in the left column → tap the corresponding drop-down menu on the right side → select the desired flash function → repeat for all switches desired → “Save”
- e. “Low Voltage Disconnect”
 - i. The LVD will turn off outputs when the battery voltage drops below 11.0, 11.5, or 12.0 volts (selectable thresholds) for 1 minute. Up to six selectable outputs can remain on. This function’s purpose is to keep the battery from draining, in the event that one or more outputs are left on
Default is On, 11.0V
 - ii. To change LVD for all outputs, click the dropdown to the right of “All Outputs” → select the desired voltage cutoff → “Next” → “Exit” on the following page
 - 1. To keep designated outputs on, regardless of the LVD, tap the dropdown next to “Output 1” → select the desired switch in the list → “Next” → “Exit” on the following page
- f. “Memory”
 - i. The memory function remembers the status of the switch before the Ignition was turned off. When memory is on, if a switch was on when ignition was shut off, that switch will turn back on when the ignition is turned back on
Default is Off
 - ii. To change, tap the dropdown menu next to the desired switch → “Memory On” → repeat for all switches desired → “Next” → “Exit”
- g. “Master Switch”
 - i. Any switch can be programmed to be a master switch to turn ON any other switches. “Master ON” will turn the selected switches ON, but switches must be turned OFF individually. “Master ON and OFF” will turn the selected group of switches ON and OFF with the press of the Master switch
Default is Off
 - ii. To set up the Master Switch, tap the dropdown menu next to “Master SW” (default should read “NONE”) → select the switch desired to be the master → locate the first switch desired to be

controlled by the master → select “Master Control On Only” or “Master Control On and Off” (see i. for explanation) → repeat if desired → “Exit”

Set LED Backlighting

1. Settings → “LED Backlighting”
 - a. To adjust the brightness of the LED indicators, when the lights trigger activates, use the top slider
 - b. To adjust the brightness of the panel backlighting, when the lights trigger activates, use the bottom slider
 - c. To change the backlighting color, either select one of the 4 preset colors, or click on the colored square. This will open a color wheel where a color selection can be made → “Save” → “Exit”

Set Switch Name & Icon

1. Settings → “Set Switch Name & Icon”
 - a. A virtual panel will appear at the top of the screen → Select which switch you want to set → A menu will appear to choose custom text or and Icon Picker
 - i. Custom Text: Enter up to 3 lines of text → click “Save”
 - ii. Icon Picker: “Tap for Options” → Scroll to view all options → Select icon → “Save”

Set Panel Name

1. The panel name will appear when scanning for devices, as well as the tab label when dual panel connection is activated
2. Settings → “Set Panel Name” → type in your preferred name (limited to 8 characters) → “Save”

Set Password

1. When set, the app will ask for a password prior to connecting to your panel.
2. Settings → “Set Password” → type in your preferred password → “Save”
 - a. If the password is forgotten, please contact Technical Support for instructions on how to reset it
TechSupport@Switch-Pros.com or 949-581-2991

Enable Output Dimming

1. By enabling Output Dimming, the user will be able to press and hold a switch, causing the respective output to dim from 100% to 50% to 10% and repeat until the switch is released

- a. The system does this by reducing the amperage flow to the output, making this applicable to accessories like lights and heated seats
 - b. When Memory Dimming is on, the output will dim to the last used dim level. (Ex. Switch 2 was dimmed to 50%, then turned off. When Switch 2 is turned on again, it will be dimmed to 50%)
 - c. When Output Dimming Presets are enabled, when the switch is turned on, it will automatically be dimmed to the specified level set in the app
2. Settings → “Enable Output Dimming” → tap the dropdown of desired switch → select “enabled” → repeat for desired switches → “Next” (proceeds to Output Dimming Presets menu) → tap the dropdown of desired switches → “On” → “Exit”

Set Auto Sleep Settings

1. The switch panel system will enter sleep mode after the preset time (8 hours default), drawing a minimal amount of current (3 mA)
 - a. The normal current draw of the system is around 35 mA. After 5 minutes of inactivity, the system will go into idle mode and the current draw will drop to 6 mA (with all switches off, no Ignition, Lights or Trigger inputs). In idle mode, the switch panel can still be accessed via Bluetooth
 - b. *In sleep mode, Bluetooth and the switch panel are disabled.* Default setting is “enabled” after 8 hours of inactivity. The system will “wake up” with the Ignition, Trigger inputs, or if any switch on the switch panel is pressed
2. Settings → “Set Auto Sleep Settings”
 - a. To disable, tap the dropdown and select “Disabled” → “Exit”
 - b. To change time preset, tap “Increase” or “Decrease” until desired time is reached → “Exit”

External Trigger Set Up

1. The external trigger function uses an input from the trigger wires to activate up to 4 outputs each. The trigger wires are connected to the desired input, and outputs are programmed within the app. *Note: The input can be set as Active High or Active Low*
 - a. Trigger 1 Mode: Normal/High Beam Lockout, when programmed, will lock out the entire panel until Trigger 1 sees an input signal
 - i. *Most commonly used in Australia to abide by laws regarding aftermarket lights*
 - b. By default, Lights/Trigger 2, when seeing an input, will dim the backlighting of the switch panel, just as vehicle dashes do when lights are activated

2. Settings → “Next” → “External Trigger Set Up” → leave as normal or select “High Beam Lockout” (see a.) → “Next” → tap the dropdown next to Trigger 1 to enable → tap dropdown to select “Active High” or “Active Low” → tap dropdown next to Output 1 to select switch → repeat for Outputs 2-4 if desired → “Next” → repeat steps for Trigger 2 if desired → “Exit”

Temperature Units

1. Default temperature units are in Fahrenheit, but can be changed to Celsius.
2. Settings → “Next” → “Temperature Units” → tap dropdown → select desired units → “Save”

Setup Connected Units

1. Settings → “Next” → “Setup Connected Units”
 - a. Do not make any changes on this page, unless instructed to do so by Switch-Pros Technical Support Team

Power-Up Switch Status

1. This setting programs outputs to immediately turn on when the system sees an ignition signal, no matter the status of the output during its last use. (Ex. Switch 1 is enabled for Power-Up Status. The vehicle’s ignition is turned on, so Switch 1 will turn on immediately and automatically. Common uses for this include fog lights, radios and whips)
2. Settings → “Next” → “Power-Up Switch Status” → tap the dropdown of desired switch → “Enabled” → repeat for all desired switches → “Exit”

Off Delay Switch Settings

1. The Off Delay setting will determine the duration an output remains on, after the ignition signal ceases
2. Settings → “Next” → “Off Delay Switch Settings” → tap the dropdown next to the desired switch → select “Enabled” → type the desired duration (in seconds) → repeat for all desired switches → “Save”

Output Overcurrent Values

1. The user can set Output Overcurrent Values for each of their outputs, in 5 amp increments. Thus, when the output draw is equal to, or more than the set overcurrent value, the system will turn the output off
2. Settings → “Next” → “Output Overcurrent Values” → tap the dropdown of desired switch → select overcurrent amperage → “Exit”

SPDT & SP3T Switch Configuration

1. SPDT and SP3T configuration allows for only one of the selected switches to be on at one time. When pressing another switch, the previously pressed switch will turn off automatically
 - a. This function, for example, can be used for lights with a high and low beam or suspension with different comfort levels
2. Settings → “Next” → “SPDT and SP3T Switch Configuration” → tap the dropdown to select the desired switch for Output 1 → for SPDT, repeat for Output 2 → for SP3T, repeat for Output 3 as well

Restore Settings to Default Values

1. This feature, also referred to as a *factory reset* will clear ALL programming of the switch panel, except the bluetooth password
 - a. *To reset the password, please contact Technical Support at 949-581-2991 or TechSupport@Switch-Pros.com*
 - b. Settings → “Next” → “Restore Settings to Default Values” → “Yes”

Dual System Connection

1. Enabling dual system connection allows the user to be connected to 2 panels at once. Once enabled, 2 tabs will appear on the home screen, labeled by the panel names. The user will then be able to toggle between the panels, without needing to disconnect from either
2. Settings → “Next” → “Next” → “Dual System Connection” → “Enable”
 - a. To connect to the secondary panel, tap the tab labeled “Panel 2” on the home screen for panel 1 → a gray box will appear with all local devices → select the secondary panel from the list → enter password if set

Summary of Programmed Functions

1. The summary of programmed functions displays all programming to the user
Note: Programming does not take place in this screen
2. Settings → “Next” → “Next” → “Summary of Programed Functions” → listed will be the user’s programming