Using Samsung SmartThings with PIXIE to Control More Devices

Blinds · https://pixiepartners.com.au/support-docs/using-samsung-smartthings-with-pixie-to-control-more-devices/

This article describes how to use ROUTINES with Samsung SmartThings to control connected devices in your home which don't have a direct PIXIE connection from a PIXIE product.

This is an extract from a support email to a customer with very specific needs.

Customer already had PIXIE installed including a PIXIE Touch Panel and PIXIE gateway.

When PIXIE was installed they did not install PIXIE Blind controls, and instead used a motorised blind motor which could be connected to Samsung SmartThings

Now, the customer wants to be able to control their blinds via the PIXIE Touch Panel.

With the PIXIE Gateway (SGW3BTAM) installed and Samsung SmartThings linked, this is achievable.

What's Needed to Make the Work?

A PIXIE Gateway is needed to allow connection to Samsung SmartThings. A gateway is also needed if you want to use a PIXIE Touch Panel.

The Routines function in the SmartThings App is the clever piece of tis solution.

This means users will be using the PIXIE PLUS App also.

In this example the customer is adding PIXIE Smart power points (SPO23BTAM).



These devices will be used because:

- - Provide a device status which can be tracked by SmartThings
- - Power points cost less than the other alternative of direct PIXIE control which would require a PIXIE Blind and signal controller per motor AND an interface device (dry contact transceiver) from the motor manufacturer - which may be 1 per motor or 1 per multiple motors, depending on the interfaces provided by different motor manufacturers.
- - The power points can simply replace an existing powerpoint that may not be used at all or not used on a regular basis. This is a simple electrical swap for a licensed electrician.
- - As these are 10A double GPOs (power points) they can be used as a smart power points with schedules, independent control of each socket and child lock functionality also.

Essentially the PIXIE Powerpoints are being used like an integration device in this example.



A PIXIE Gateway is required to allow SmartThings Connectivity.

Operational Concept

Using Samsung Smarthings **ROUTINES**, it’s possible to track the ‘state’ of a PIXIE device which has been synced with Smarthings App and have something else from another manufacturer also synced to Samsung Smarthings – in this case motorised blinds – operate in kind.

This means it will be possible to control the SmartThings connected motors fully OPEN and fully CLOSED functions in these ways:

- - individually
- - together
- - ad hoc as needed
- - on schedules
- - from a PIXIE Touch Panel, PIXIE App

Things to Know

When using the PIXIE smart power points, each socket (left or right) appears in SmartThings as an individual socket which is useful for this application.

SmarTthings does not track PIXIE scenes - BUT you can still use scenes in PIXIE to control blinds.

PIXIE Scenes can impact many PIXIE master devices like the smart power point, and it is the state of the PIXIE devices which is being tracked by the SmartThings routine.

- - For example you may have an "all blinds closed" SCENE in PIXIE, which in turn operates a number of sockets on a number power points, the state of which each socket is being tracked by Samsung.
- - So a single Scene button from the PIXIE touch panel to make many things happen.

You can track the ON and / or the OFF state of each socket on each power point. This means each socket can control and up and a down (on or off). This means each power point can impact 2 of your blind motors for individual control.

Stacking IF and THEN Functions in SmartThings

Its possible in SmartThings to stack these conditions in routines – but these are treated as an **AND** condition.

This means if you track the ON state of socket 1.1 (meaning power point 1, socket 1) and the ON state of socket 2.2 (meaning power point 2, socket 2) THEN BOTH of these conditions MUST be true BEFORE the related SmartThings actions would be performed by the routine.

So take care about CONDITIONS when creating routines. We suggest you start with simple actions and confirm they work as expected and then get more sophisticated should there be a need.

Also be aware you can stack THEN conditions as part of the routine, so from a single state change on a PIXIE device, multiple events can occur in the SmartThings system.

For example a single socket on / off command could potentially be used to control ALL of your blinds open and closed together. This depends on SmartThings and the 3rd party motors ability to receive commands like this.

PIXIE Scenes can have DELAYS between actions.

This is recommend using this IF you have any issues with SmartThings responding correctly and reliably. That is, delay what PIXIE is doing via the SCENE DELAY function, to allow SmartThings time to process everything.

Put a delay after each PIXIE Scene action (socket 1.1 on for example) if you are creating a scene to impact multiple PIXIE devices.

Setting it all up

Note as much of this is done in the SmartThings app, and we have no control over how that works now and how that will work in the future, therefore these are general guidelines.

From a PIXIE Plus perspective simply scan, add and name the PIXIE power points and give each socket a useful name for use in the SmartThings Routines.

Make sure these devices are available in SmartThings. These should sync automatically but if not use the SmartThings app to resync.

Head to Routines in the SmartThings App and follow the simple to understand instructions.

The option is "IF --> Device Status... --> select Device"

What Happens Now?

Once this is setup and you have tested it, whenever and however the PIXIE devices being tracked by SmartThings, enter the state being tracked, the function will occur.

This means whether you operate each or both sockets from the PIXIE app/ touch panel devices page, operate a group with PIXIE power points included, issue a voice command with PIXIE power points included, recall a scene with PIXIE power points included, or operate the sockets directly from the buttons on the power point - the the ROUTINE will be performed.

Using the CHILD LOCK function on the power points is a good way to stop these being inadvertently operated in home by naive users.

Remember that this connection requires an internet connection as the way PIXIE communicates to SmartThings is via the internet connection. If your Internet is down these Routines cannot operate.

It is unknown if for example, you recall a PIXIE scene, which turns your tracked power points ON, which should OPEN certain blinds, BUT your internet is down so this state change is not immediately update in SmartThings - when internet is returned and STATUS of PIXIE devices is updated, if the ROUTINES will then operate.

What Can't be Done?

In this example no STOP command has been provided, only fully open and fully closed, however this could be achieved by adding more power points specifically for operating stop commands, but this may not be practical from a cost and installation perspective.

Of course the blinds can still be operated in the normal way either via SmartThings directly or via any remotes provided by the manufacturer at time of installation.

Nothing PIXIE does with this integration, negatively impacts that control methodology.