

## Example interactions

### Direction

> is app to amp

< is amp to app

### Starup sequence between app and amp

Direction	Command	Parameters	Description
>	02 11		Get amp name
<	03 11	0x08 Spark 40	Amp name
>	02 24	00 01 02 03	<b>Unknown</b>
>	02 23		Get serial number
<	03 23	Serial number 0xf7	Serial number
>	02 01	00 00	Get preset 0
<	03 01		Preset 0
>	02 01	00 01	Get preset 1
<	03 01		Preset 1
>	02 01	00 02	Get preset 2
<	03 01		Preset 2
>	02 01	00 03	Get preset 3
<	03 01		Preset 3
>	02 10		Get current hardware preset on amp
<	03 10	00 01	Hardware preset number
>	02 2F		Get firmware version
<	03 2F	01 00 02 fd	Firmware version
>	02 01	01 00	Get current amp settings
<	03 01		Current amp settings in preset format

### Other messages from app to amp (and responses)

Direction	Command	Parameters	Description
>	01 04	"Twin", 0, 0.5	Increase amp gain
>	01 15	"Twin", Off	Turn amp off
<	04 15		Acknowledge change
>	01 38	00 01	Change to hardware preset 1 (2-Crunch)
<	04 38		Acknowledge change
>	01 01	<i>preset info</i>	Change to "Sweet Memory" preset (sent in multiple messages)
<	04 01		Acknowledge part of preset info
>	01 01	<i>preset info</i>	Next block of preset info
<	04 01		Acknowledge part of preset info
>	01 01	<i>preset info</i>	Next block of preset info
<	04 01		Acknowledge part of preset info
>	01 01	<i>preset info</i>	Next block of preset info
<	04 01		Acknowledge part of preset info
>	01 38	0x 7f	Change to hardware preset 0x7f
<	04 38		Acknowledge change
>	01 06	"Flanger", "Phaser"	Change Mod type from Flanger to Phaser
>	01 04	"Phaser", 0, 0.5	Update parameter 0 on Phaser
>	01 04	"Phaser", 1, 0.7	Update parameter 1 on Phaser

#### Other messages from amp to app (with responses)

Direction	Command	Parameters	Description
<	03 06	"Matchless", "OverDrivenJM45"	Change the amp selection on the amp to "Crunch"
<	03 37	"OverDrivenJM45", 0, 0.4	Change gain knob on amp
<	03 38	0	Change preset on amp to 0 (1-Clean)
<	03 27	3	Save current setting on amp to preset 3 (long press on preset 3 button)
>	02 01		App now asks amp for its settings in preset 3
<	03 01		Sending preset details (sent in multiple messages)
<	03 01		Next block of preset info
<	03 01		Next block of preset info
<	03 01		Next block of preset info
<	03 37	"DelayMono", 0, 0.1	Change 'level' on delay
>	01 04	"DelayMono", 0, 0.1	Tell the amp what it just told the app - like an echo
<	03 15	"DelayMono", off	Change the parameter on delay to full anti-clockwise which turns the effect off
<	03 63	88	Press tap tempo a few times and it will send tempo information to the app
<	03 37	"DelayMono", 4, 1.00	And tap tempo then sets parameter 4 in the delay to 1.00. Parameter 4 is the BPM switch on the UI

The interesting thing here is if you save current state into a hardware preset on the amp, it triggers the app to ask for that preset state. The only time you can get the app to ask for something.