

# Command:SAM

MS2000 or RM2000 syntax

<b>Shortcut</b>	SAM
<b>Format</b>	SAM [axis]=### ...
<b>Units</b>	Integer code, 0-4 (see below)
<b>Remembered</b>	Using SS Z
<b>Firmware Module</b>	<a href="#">SINGLEAXIS_FUNCTION</a>

Tiger syntax

<b>Shortcut</b>	SAM
<b>Format</b>	SAM [axis]=### ...
<b>Units</b>	Integer code, 0-4 (see below)
<b>Type</b>	Axis-Specific
<b>Remembered</b>	Using [addr#]SS Z
<b>Firmware Module</b>	<a href="#">SINGLEAXIS_FUNCTION</a>

Sets the single-axis mode according to the integer code.

**Note:** For the TTL-triggered modes (2 and 4), the controller needs to be in the **TTL X=30** input mode.

Code	Meaning
0	Puts single-axis mode in idle state (i.e. stops it if running)
1	Puts the single-axis mode in active state (i.e. starts generating the pattern)
2	Arms the trigger; the routine only cycles once, then waits again for another TTL trigger. <i>Tiger 3.31+</i>
3	Makes the single-axis mode active and restarts the pattern of any other axis on the same card so they will be synchronized
4	Arms the trigger; the routine is free running after the TTL trigger. <i>Tiger 3.41+</i>

**Note:** On Tiger v3.29 and previous versions, mode 2 has the same behavior as mode 4.

**Note:** In modes 2 and 4, there is a delay of 0.25 to (Servo Lp Time + 0.25) milliseconds before the waveform starts after the initial TTL trigger. To check the Servo Lp Time use the [INFO](#) command.

## Example

```
SAM A=0
:A
```

Disables the routine for the A axis

```
SAM A=1
:A
```

Enables the routine for the A axis

SAM B=2  
:A

Arms the routine for the B axis. The routine for B will start running on receipt of a TTL pulse.



**Note:** In Tiger version 3.29 and prior the routine is free running after the TTL trigger. In version 3.31 and later, the routine only cycles once, then waits again for another TTL trigger. As of Tiger version 3.41, in mode 4 the routine is free running after the TTL trigger.

SAM B=3  
:A

Enables the routine for the B axis. Also the routine for A axis is reset, so they will both run in sync

[commands](#), [tiger](#), [ms2000](#), [singleaxis](#)

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