HSM3105 Worst Case Loop Current Calculator v1.04

Power Mode	High Power-HSM2204 PSU	Max. 243mA @40V

MX Loop Composition

Quantity	Type	Inrush Current [mA @40V]	Alarm Current [mA @40V]
0	MX920 - Isolator	0,0	0,0
0	MX974 - Wall PIR	0,0	0,0
0	MX922 - Glass-Break	0,0	0,0
0	MX862 - Ceiling PIR	0,0	0,0
0	MX916 - Smoke + Heat	0,0	0,0
0	MX926 - Smoke	0,0	0,0
0	MX936 - Heat	0,0	0,0
0	MX975 - Magnetic Contact	0,0	0,0
0	MX975-I - Input Contact	0,0	0,0
0			

% Alarmed Devices at same time:	34%

Total Current

	mA @40V	mA @12V	Max Loop LOAD
Inrush Current	0,0	100	0%
Alarm Current	0,0	100	0%

Glossary:

Alarm Current The current drained by the loop device when this is in Alarm condition with its LED ON

Inrush Current The Current drained by the loop device when the loop is powered ON

Power Modes The supply mode of the HSM3105.
When "Low Power" is selected the module is powered by the Panel itself.
When set in "High Power" the module is powered by External PSU

Notes:

Total Current @12V takes in account the HSM3105 board electronics needed current

Refer back to the PSU manual to make sure about the available output current

For MX920 isolator the 16mA current (isolator active) is not part of this spreadsheet calculation since this is t

Instructions:

- ← Select Power mode and program the board accordingly

- ← Edit the quantity of MX devices according to their type.

- ← Expected percentage of devices with Alarm LED turned ON at the same time

- ← If this Load is higher than 100% the loop cannot turn ON
- ← If this Load is higher than 100% the loop could go in overcurrent and consequently shut down

If any of the 2 indicators is higher than 100% the possible actions are:
- Reduce number of loop devices.
- Change the Power Mode for higher current capability

riggered by a short circuit fault on the loop.