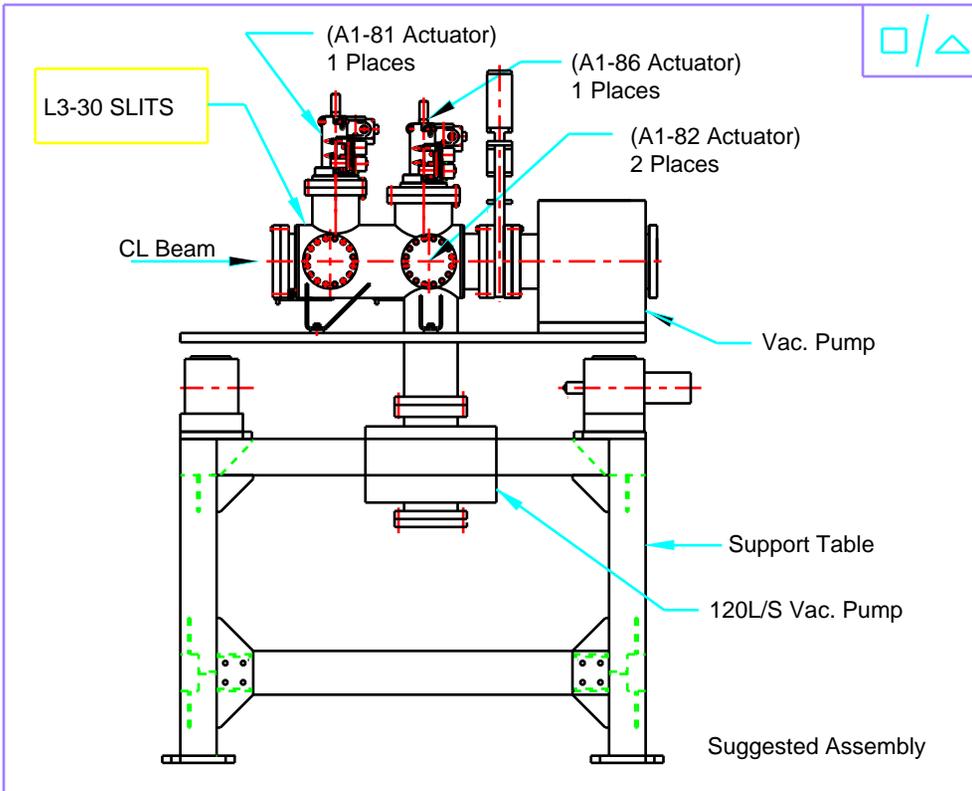


L3-30 ID Beamline Slits

These slits have been designed for the APS X-ray Bending magnet beamlines. Shown are two horizontal and two vertical slits with actuators and vacuum tank. Each slit consists of a water cooled copper/molibdenum plate with "knife edge". Being placed from two sides of the beam, each slit individually moves with help of it's actuator perpendicular to beam direction and cuts it off. The actuators are equipped with linear measuring encoders and limit switches for slit position indication.



Design Specifications:

- Maximum heat load : 600 Watts from APS 7GeV, 100mA
- Location : 22.8m from APS BM source center
- Aperture size : 120mm horizontal x 30mm vertical
- Maximum acceptance : 5.26mrad horizontal x 1.31mrad vertical
- Slit travel : 75mm horizontal x 30mm vertical
- Slit scanning range : 30mm horizontal x 30mm vertical (in center)
- Slit material : Tantalum(TA-222), 5mm thick
- Slit gemetry : "Knife Edge"
- Slit pad materil : Copper
- Slit cooling : Water cooled
- Water tube connectors : 3/8" O.D. tube, 1/4 P-NPT male connector
- Horizontal slit actuator : APS A1-82 light load stepping 75mm-6.75" O.D. linear actuator
- Vertical slit actuator : APS A1-81 light load stepping 30mm-6.75" O.D. linear actuator, APS A1-86 light load stepping 30mm-6.75" O.D. linear actuator
- Input flange O.D. : 8" CF flange
- Output flange O.D. : 8" CF flange
- Flange to flange device length : 465mm
- Actuator maximum speed : 20mm/min
- Actuator resolution : .0004mm/step
- Vacuum: UHV compatible

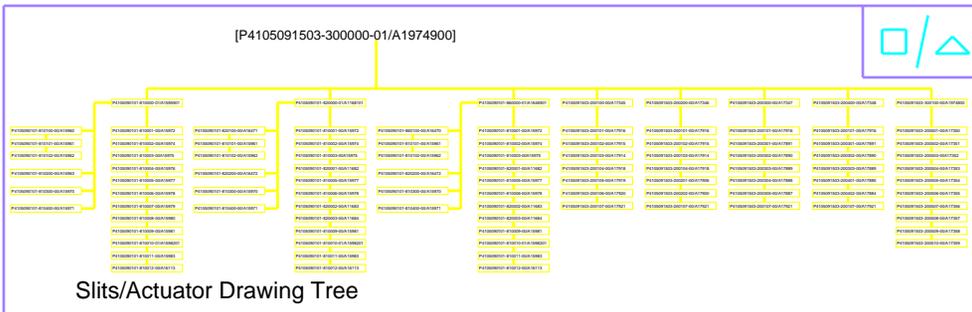
Download:

- [This page](#)
- [Main assembly](#)
- [All slit/actuator dwgs](#)
- [Toolbox symbol](#)
- [Specifications](#)

Information - viewing:

- [Sub-assy & details](#)
- [Toolbox symbol](#)
- [Procurement status](#)
- [DX library status](#)
- [Support table](#)

References:



Slits/Actuator Drawing Tree