

All PMTs have 12 dynodes. Except as noted, all have CuBe dynodes.

Detector	PMT	Base	HVmax	HV _{nominal}	Gain Slope @HV _{nominal}	Nominal Transit Time	Comments
HMS Scint. Hodoscope	XP2262B	JLab zenerized Type B-ish	-2300V (resistor limit) or 2E8 gain	-1800V for 5E6 gain (4 mV spe)	x2 per 100V	31 nsec	Contribution of the bases to stability should be excellent into the MHz regime.
SHMS Scint. Hodoscope Type 1	Ditto	Ditto	Ditto	-1900V for 1E7 gain (8mV spe)	Ditto	Ditto	Ditto These scints are thinner than in the HMS so I assume we'll need twice the HMS gain.
Type 2	ET9214B (SbCs dynodes)	JMU Resistive Type A-ish C36A equivalent	-2300V (V _{k-d1} limit) or 3E7 gain	-1325V for 1E7 gain (8mV spe)	x2.5 (high) x2 (med.) x1.4 (low) per 100V	45 nsec	This lot of tubes has an unusually wide variation in gains and gain slopes. When setting up a hodo trigger or offline cuts, keep in mind the ~14 nsec mismatch in transit times between the two types of pmts.
SHMS Quartz Hodoscope Type 1	XP2020Q	ET RB1106ASP-03 Resistive Type-A	+3000V or 2E8 gain	+1800V for 1E7 gain (8mV spe)	x1.6 per 100V		These tubes are tripping, possibly due to high internal gas levels. They will likely be replaced with ET9814Q (below).
Type 2	ET9814QB	ET RB1102-11 C638AFP Variant Resistive Type A-ish	+2500V (V _{k-d1} limit) or 3E7 gain	+1650V for 1E7 gain (8mV spe)	x1.7 per 100V	43 nsec	At the max gain of 3E7 gain, 1/3 of these tubes become noisy. If we need more gain than 1E7, we'll have to install preamplifiers.