

AN-026 VAX system performance chart

The performance of a VAX system is frequently defined in VAX Units of Processing (VUPs). One VUP is the capacity of the 'original' VAX, the 11/780. The VUP performance of a VAX system is one factor in determining the choice of CHARON-VAX emulator model.

The list below shows the MicroVAX systems most commonly replaced by CHARON-VAX. For comparison, consider the following average CHARON-VAX VPU's performance:

<i>Product</i>	<i>Platform</i>	<i>VUPs</i>
CHARON-VAX/AXP Plus	OpenVMS/Alpha EV7 1 GHz	25
CHARON-VAX/Industrial	Windows / 2 GHz dual Xeon	15
CHARON-VAX/XM/XL	Windows / 2 GHz dual Xeon	15
CHARON-VAX/Industrial Plus	Windows / 2.8 GHz dual Xeon	60
CHARON-VAX/XM/XL Plus	Windows / 2.8 GHz dual Xeon	60

Systems typically replaced with CHARON-VAX/Industrial:

<i>Name</i>	<i>VUPs</i>	<i>Bus</i>	<i>VMS version</i>
MicroVAX I	0.3	QBUS	V4.1 -> V5.1-1
MicroVAX II	0.9	QBUS	V4.1 ->
MicroVAX 2000	0.9	none	V4.5B ->
MicroVAX 3100-10 / MicroVAX 3100-20	2.4	SCSI	V5.2 ->
MicroVAX 3100-10e / MicroVAX 3100-20e	3.5	SCSI	V5.3 ->
MicroVAX 3100-30 / MicroVAX 3100-40	5.0	SCSI	V5.5 ->
MicroVAX 3100-80	12.0	SCSI	V5.5 ->
MicroVAX 3300 / MicroVAX 3400	2.4	QBUS	V5.0-2A ->
MicroVAX 3500 / MicroVAX 3600	2.7	QBUS	V4.7A ->
MicroVAX 3800 / MicroVAX 3900	3.8	QBUS	V5.1 ->
VAX 4200	5.0	QBUS	V5.4-2 ->
VAX 4300	8.0	QBUS	V5.3-2 ->
VAX 4400	16	QBUS	V5.5-2HW ->

CHARON-VAX application note

Systems typically replaced with CHARON-VAX/XM Plus
(VMS V5.5-2H4 or later):

<i>Name</i>	<i>VUPs</i>	<i>Bus</i>	<i>VMS version</i>
MicroVAX 3100-85 / MicroVAX 3100-88	16.0	SCSI	V5.5-2H4 ->
MicroVAX 3100-90	24.0	SCSI	V5.5-2HW ->
MicroVAX 3100-95	32.0	SCSI	V5.5-2H4 ->
MicroVAX 3100-96	41.0	SCSI	V5.5-2H4 ->
VAX 4100	24.0	QBUS	V5.5-2HW ->
VAX 4100A	24.0	QBUS	V5.5-2H4 ->
VAX 4105A	32.0	QBUS	V5.5-2H4 ->
VAX 4106A	42.5	QBUS	V5.5-2H4 ->

Systems typically replaced with CHARON-VAX/XM Plus or
CHARON-VAX/XL Plus (if > 128 MB VAX memory required):

<i>Name</i>	<i>VUPs</i>	<i>Bus</i>	<i>VMS version</i>
MicroVAX 3100-98	41.0	SCSI	V5.5-2H4 ->
VAX 4108	41.0	QBUS	V5.5-2H4 ->
VAX 4500	24.0	QBUS	V5.5 ->
VAX 4500A	24.0	QBUS	V5.5-2H4 ->
VAX 4505A	32.0	QBUS	V5.5-2H4 ->
VAX 4600	32.0	QBUS	V5.5 ->
VAX 4600A	32.0	QBUS	V5.5-2H4 ->
VAX 4700	40.0	QBUS	V5.5 ->
VAX 4700A	40.0	QBUS	V5.5-2H4 ->
VAX 4705A	45.0	QBUS	V5.5-2H4 ->