What are the Benefits of Using DECnet over TCP/IP?

DECnet over TCP/IP allows you to balance the demands of existing application users without the pressure to reduce or simplify network infrastructure.

- A single network backbone, transmitting multiple network protocols (including NSP, OSI, and TCP) enables the coexistence of DECnet and TCP/IP.

- DECnet over TCP/IP allows DECnet traffic to be routed through any TCP-enabled network, including the public Internet. No special DECnet routers are required.

With DECnet over TCP/IP, you can combine separate DECnet networks without renumbering the network. For example, if two companies merge, and both companies have systems with the same node addresses, an IP link between the two networks ensures the addresses are unique to the LAN. No costly (and confusing) readdressing of the nodes is required.

DECnet over TCP/IP also offers protection from intrusions from Internet users. TCP/IP-based intranets need to actively secure the intranet from intrusions. DECnet implements the security on the system you are connecting to.

What Software Do I Need?

You probably already have the required software: DECnet-Plus and TCP/IP Services for OpenVMS.

Licenses for both products are included in the HP Enterprise Integration Package, which ships with HP OpenVMS Alphaserver systems.

No additional products or licenses are required to run DECnet over TCP/IP

How Do I Use DECnet over TCP/IP?

In addition to installing DECnet-Plus and TCP/IP Services for OpenVMS, you must enable the PWIP driver when you configure TCP/IP Services.

The decision to use DECnet or IP as a transport is based on the remote node address supplied either by the application or the user. You can force a DECnet connection if you supply a DECnet node address or a DECnet fullname. You can force an IP connection if you supply an IP node address or a TCP/IP fullname.

If you, or the DECnet application, uses a DECnet synonym (also known as an "alias," or a DECnet shortname), DECnet session control will select the transport based on how the network manager configured the system.

Where Can I Get More Information About DECnet over TCP/IP?

- DECnet-Plus for OpenVMS *Applications Installation and Advanced Configuration Manual* (Order Number A-QPSVB-TE)
- DECnet-Plus for OpenVMS *Network Management* (Order Number AA-R1UHA-TE)
- TCP/IP Services for OpenVMS *Installation and Configuration Guide* (Order Number AA-LU49N-TE)

What is DECnet Over TCP/IP?

DECnet over TCP/IP provides a way for DECnet applications use TCP/IP as a network service instead of the DECnet service.

It allows the coexistence of DECnet and TCP/IP applications in the network,so that:

- You can use older DECnet and TCP/IP applications “as is,” with no rewriting or reengineering required to support a new network stack.
- You can write new IP applications for ebusiness and the Internet
- You can maintain a single network backbone for cost savings and ease of network management.

DECnet over TCP/IP is based on the following RFCs:

- RFC 1006 -- OSI Applications over TCP/IP
- RFC 1859 -- DECnet over TCP/IP
- RFC 2126 -- OSI and DECnet Applications over IPv4 and IPv6

HP OpenVMS

DECnet Over TCP/IP

Quick Reference Card

Hewlett-Packard Company
Palo Alto, California