

Apollo/Integrated SNA LU 6.2

Technical Data

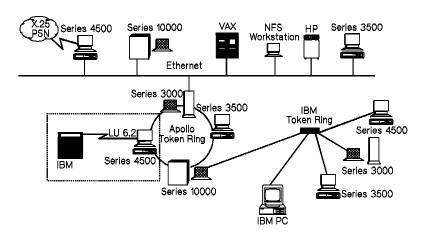
Product number LAA1A

Description

Apollo/Integrated SNA LU 6.2 is a Systems Network Architecture (SNA) communications product that extends Apollo's networking to include IBM's Advanced Program-to-Program Communications (APPC).

The product is a developer's kit which enables Apollo workstation customers to develop an application program on the workstation. The program can then communicate with a related application on an IBM processor, such as a System/370 mainframe, AS/400, or other physical unit 2.1 node on the network.

Apollo/Integrated SNA LU 6.2 provides a high level of support for LU 6.2 and handles the most sophisticated program-to-program applications. Apollo/Integrated SNA LU 6.2 is ideal for Original Equipment Manufacturers (OEMs), third parties, and end users looking for a long-term investment in an applications development platform.



On the Apollo workstation, the application is written using the Apollo/Integrated SNA LU 6.2 verbs. The verbs implement the base function set plus a number of option sets of the LU 6.2 architected basic verbs defined by IBM. The LU 6.2 verbs are used by the application transaction program to carry on a conversation with a partner transaction program on another PU 2.1 node.

Features

- Supports Apollo workstation applications and system calls written in Fortran, C, or Pascal.
- Supports UNIX®, BSD 4.3, System V.3, or Aegis environments.
- Takes full advantage of APPC through a powerful API that provides transport layer access for the application.
- Supports LU 6.2's basic set of conversation verbs and nine defined option sets.
- Can be tailored to the application and processor being used.
- Implements its verb set through system calls.

PU 2.1

Physical Unit 2.1 (PU 2.1) and PU 2.0 are available through Apollo/Integrated SNA Facility, depending on the network configuration. PU 2.1 applies when Apollo/Integrated SNA LU 6.2 is installed in peer-to-peer configurations, such as connecting an Apollo network to a nonmainframe computer (such as an AS/400) running LU 6.2 or when two Apollo workstations are connected as peers. PU 2.0 is normally used when connecting to IBM mainframes under existing IBM host access software. However, depending upon the configuration, Apollo networks will run PU 2.1 for connections to the IBM System/370-compatible mainframe.

With PU 2.1, both parallel and multiple sessions are supported. • Parallel sessions permit a single LU 6.2 session to be designated for an application, such as electronic mail, and support any number of simultaneous users. This eliminates each user having a separate session for the same application. Multiple sessions permit a single LU 6.2 session to access an application running concurrently at different sites, such as electronic mail running on separate computers. PU 2.1 supports up to 254 LU 6.2 sessions.

Systems Administration

Apollo/Integrated SNA Facility offers a comprehensive system administration capability that uses LU 6.2 control operator verbs as well as mouse and menu-driven control and configuration functions. The operator interface allows system administrators to access network, session, and configuration services, along with control and management functions.

Option Sets

- Immediate allocation of a session
- PIP data (both local and remote support)
- Flush the LU's send buffer
- Prepare to receive
- Long locks
- Post on receipt with wait
- Post on receipt with test for posting
- Test request-to-send received
- Get conversation attributes

Apollo/Integrated SNA LU 6.2 verbs are summarized in the following table:

allocate	Establishes a mapped conversation between two transaction programs (TP).
confirm	Sends a confirmation request to the remote TP and waits for a reply.
confirmed	Sends a confirmation reply to the remote TP in response to receiving a confirmation request.
deallocate	Ends a mapped conversation between TPs.
get_attributes	Returns information pertaining to a mapped conversation.
flush	Flushes the LU's send buffer.
prepare_to_receive	Changes the conversation from send to receive state in preparation for receiving data.
receive_and_wait	Waits for information to arrive on the mapped conversation and then receives the information. The information can be date, conversation status, or request for confirmation.
request_to_send	Notifies the remote TP that the local TP is requesting to send data for the mapped conversation.
send_data	Sends data to the remote TP.
send_error	Informs the remote TP that the local TP has detected an error.
lu62_waitcv	Waits for the receipt of information on one or more conversations.
getlu	Acquires ownership of an SNA LU-LU session for a local TP.
lu62_dactses	Frees an LU-LU session that was acquired by, or allocated for, a TP.
lu62_atoe	Converts ASCII data to EBCDIC.
lu62_etoa	Converts EBCDIC data to ASCII.

Customer Installation Responsibility

The product is customer-installable. User installation aids such as an automated installation procedure are provided, along with the manual "Configuring and Managing the Apollo/Integrated SNA Facility" which is shipped with the Integrated SNA Facility product. Additional assistance can be provided by an HP System Engineer on a time-and-materials basis. For additional information, contact your Hewlett-Packard sales representative.

Ordering information

Requires previous installation of Apollo/Integrated SNA Facility gateway LAA0A and SNA communications controllers (Serial Controller-AT or Channel Controller-AT).

Customer must order LA1A and one option from media and documentation group.

LAA1A Apollo/Integrated SNA LU 6.2 for Apollo workstations

License, Media, and Documentation

Option:
BAC:SR10, magnetic tape
BAD:SR10, cartridge tape
BBC:Prism, magnetic tape
BBD:Prism, cartridge tape

Documentation

7760-A01 Planning for Apollo/Integrated SNA 7763-A01 Configuring and Managing the Apollo/Integrated SNA Facility 10017-A01 Apollo/Integrated SNA LU 6.2 Transaction Verb Reference

 $UNIX^{\otimes}$ is a registered trademark of UNIX System Laboratories Inc. in the U.S.A. and other countries.