Software Product Description

PRODUCT NAME: DEC ACB for OpenVMS Version 2.3   **SPD 39.53.03**

DESCRIPTION

DEC ACB is a management utility that facilitates the secure connection to an OpenVMS VAX or AXP system from a terminal or a PC.

Users can access a host system running DEC ACB directly, or they   can supply a phone number on which ACB will call the user back and start the required session. Users can be validated by the local DEC ACB system or on a remote DEC ACB system running the Remote Authentication Interface Server. This latter option is only available in a DECnet network.

Users are authenticated based on a random challenge and response, which protects the system from Replay Attacks.

The password is automatically changed at each connection creating a secure system that requires minimal password management, and which renders line tapping ineffective. Use of the Racal Watchword Generator and Security Dynamics token are supported, and any type of challenge-response system can be easily integrated into your ACB system.

DEC ACB supports access from PCs running MS-DOS and MS Windows. The PC clients contain simple user interfaces that allow users to automate the connection sequence and connect to the host system (after authentication) from local or remote locations.

DEC ACB provides a Reporting and Billing utility that reports usage of the DEC ACB system, and uses user definable fields in the accounting file to calculate operating costs using local PSDN charges and currencies.

FEATURES

Management Utilities

- Store and manage profiles for lines, users, phone numbers, modem types, authentication and sessions in an RMS database.

- Automatically load OpenVMS authorization file entries in the DEC ACB database for LOGINOUT callouts usage.

- Use configuration scripts for easy creation of DEC ACB line and user profiles.

- Manage asynchronous DDCMP connections.

- Control interactive LAT access to an OpenVMS VAX or AXP system.

- Capability to integrate the MS-DOS PC client into DEC MAILworks for DOS as a user defined asynchronous service.

- Provides a Reporting and Billing utility that can be configured to country specific call rates and currencies.

- Configurable line selection algorithm for dialback.

Principle DEC ACB Management Commands

- ACCOUNTING, which provides information on DEC ACB usage.

- ADD/MODIFY/DELETE/SHOW, used to manage the DEC ACB database object profiles listed above, and to display configuration and status information.

- START/STOP/SHUT, to start and stop the DEC ACB symbiont and to SHUT access.

- TELL, to send a DEC ACB management command to a remote DEC ACB system.

Authentication

- MS-DOS and MS Windows PC clients that allow automatic dialup and access validation (including strong user authentication) to a DEC ACB system, or an OpenVMS system with DEC ACB LOGINOUT callouts installed.

- Capability of replacing the default OpenVMS password authentication system with any DEC ACB authentication mechanism based on selected terminal types or names (DEC ACB LOGINOUT callouts)

- Remote Authentication Interface Server that provides user validation on a remote DEC ACB system, a remote management capability and remote modem troubleshooting.

- The client/server communication is secured by mutual authentication, based on a DEC ACB system key, which preserves the integrity of the systems involved.

Security

- Detects and reports invalid login attempts. Optionally, can disable a user account suspected of breakin after a predefined number of consecutive login failures have occurred.

- Detects inactivity (based on I/O throughput) and automatically disconnects sessions after delivering a user warning.

- Provides entry points for login under duress detection and alternate callback failure handling.

Protocol Support

- Dialup terminal lines

- LAT connections

- Any type of interactive access to an OpenVMS VAX or AXP system, with the exception of DECwindows login. This is achieved by replacing the default LOGINOUT authentication procedure with DEC ACB authentication.

Type of Sessions Supported

- INTERACTIVE, the local system username prompt is displayed (LOGINOUT procedure)

- LAT, the user has access to a DECserver emulator, also referred to as VTLAT. The user can simultaneously connect to up to 12 LAT services. DEC ACB records accounting information concerning the LAT services used.

- DECNET, an asynchronous DDCMP connection is started on the current active connection. Note that this option is only valid on asynchronous communications controllers. Using this session type on a terminal server is not supported by DIGITAL.

- TELNET, the user has access to an ULTRIX connection for the VMS TELNET utility, and can connect to host systems on a TCP/IP network.

- REMOTE, the user has access to a DECnet node using the OpenVMS SET HOST utility.

- MAILWORKS, the DEC MAILworks CTI broker is automatically invoked. The user can use the MS-DOS MAILworks client or the TEAMlinks MS Windows client to connect to a host system.

Note : It is possible to define custom session types. For example, to create a bulletin board system, or run an application from a captive and secure environment. A single user can be granted access to several session types, and select the required session type during the DEC ACB login procedure or by setting the appropriate parameter when using the MS-DOS or MS Windows PC clients.

Miscellaneous Features

- Provides an Application Programming Interface (API) that allows:

- modem driver development

- authentication development

- database and accounting information storage and retrieval

- user validation (using authentication)

- line selection algorithm development

DOCUMENTATION

- DEC ACB for OpenVMS Installation Guide

- DEC ACB for OpenVMS Manager's Guide

- DEC ACB for OpenVMS Programmer's Guide

- DEC ACB for OpenVMS PC Client User's Guide

- DEC ACB for OpenVMS VTLAT User's Guide

- DEC ACB for OpenVMS Terminal User's Reference Card

- DEC ACB for OpenVMS MS-DOS Client User's Reference Card

PERFORMANCE CONSIDERATIONS

A DEC ACB system can handle any number of asynchronous lines, or LAT incoming connections at the same time. OpenVMS VAX or AXP system resources are the only constraints on the capacity of the DEC ACB system.

When using the DECserver emulator (VTLAT) provided with DEC ACB, it is expected that a MicroVAX-II class machine can handle up to six high speed connections; that is, continuous character flow at 9,600bps at the same time without noticeable performance degradation.

Some latency has been observed when dealing with DECserver lines; this is due to the IO buffering performed at various levels. There is no extra load on the system for any other session types supported by DEC ACB. The load is the same as it would be if the user were connecting to the system directly.

HARDWARE REQUIREMENTS

Any valid OpenVMS VAX or AXP system configuration with a minimum CPU capacity of 0.9 VUP (MicroVAX-II class machine).

Minimum Hardware Requirements

For dialup access control, one or more asynchronous modems connected to the telephone network, supporting one of the following Automatic Dialing Unit protocols:

- AT command set (Hayes Smartmodem protocol)

- DMCL (Digital Modem Command Language)

- Any protocol that complies with the V.25bis CCITT recommendation

One or more of the following asynchronous communication systems:

- 802.3/Ethernet terminal servers supporting limited or full modem control (DECserver 200/MC, DECserver 700-16, DECserver 700-08, DECserver 550 with CXY08-Ax option)

- BI communications controllers with full modem control (DMB32, DHB32 with CK-DHB32-Ax cabinet kit)

- Q-bus communications controllers with full modem control (CXY08, DHQ11, DHV11)

- Unibus communications controllers with full modem control DHU11, DMF32 port 0 and 1, DMZ32 with CK-DMZ32-AY cabinet kit).

- One or more asynchronous communication cables (BC22E-xx, BC22F-xx). Optionally, BC-23C-01 for terminal server connection (can be ordered from field-service).

Consult the Telecommunication and Network Buyer's Guide for detailed information.

Optional Hardware

The following hardware is required for authentication:

- Personal Computer, IBM PC Compatible

- Racal Watchword Generator Token

- Security Dynamics authentication token

Processors Not Supported

MicroVAX I, VAXstation I, VAX-11/725, VAX-11/782, VAXstation 8000

Processor Restrictions:

A TK50 Tape Drive is required for standalone MicroVAX 2000 and VAXstation 2000 systems.

Disk Space Requirements (Block Cluster Size = 1):

Disk space required for 3924 blocks VMS DEC ACB installation:

Disk space required 1702 blocks for VMS DEC ACB use (permanent):

Disk space required for 7704 blocks Alpha DEC ACB installation:

Disk space required 2139 blocks for Alpha DEC ACB use (permanent):

CLUSTER ENVIRONMENT

DEC ACB does not share asynchronous devices in a cluster. However, the user, phone, modem, authentication and session profiles can be common across a cluster.

SOFTWARE REQUIREMENTS

OpenVMS VAX V7.0 and later or OpenVMS AXP V7.0 and later

Optional Software

The following optional software can be used with DEC ACB:

- DECnet
- DIGITAL TCP/IP Services for OpenVMS

For optional PC-based authentication systems:

- MS-DOS V3.3 or later (MS-DOS PC client)

- MS Windows V3.1 or later (MS Windows PC client)

- Terminal emulation software for MS-DOS or MS Windows (for example, Kermit,

- SETHOST, SmartTerm, MS Windows built-in Terminal utility)

- DEC MAILworks for DOS V1.1 or later

- ACM/5100 is required for SecurID authentication

GROWTH CONSIDERATIONS

The minimum hardware/software requirements for any future version of this product may be   different from the requirements for the current version.

DISTRIBUTION MEDIA

9-track 1600 BPI Magtape, TK50 Streaming Tape.

ORDERING INFORMATION

DEC ACB Server :

DEC ACB for OpenVMS VAX Software license:
Q2-GFYA*-**

DEC ACB for OpenVMS VAX Software Update license:
Q2-GFYA*-**

DEC ACB for OpenVMS VAX Media and documentation:
Q2-GFYAA-H*

DEC ACB for OpenVMS documentation:
Q2-GFYAA-GZ

DEC ACB for OpenVMS AXP Software license:
Q2-36XA*-**

DEC ACB for OpenVMS AXP Software Update license:
Q2-36XA*-**

DEC ACB for OpenVMS AXP Media and documentation:
Q2-36XAA-H*

 DEC ACB Software Orientation & Installation Services:
QS-GFYA9-A9

DEC ACB Software Orientation & Installation Services:
QS-36XA9-A9

DEC ACB Client:

DEC ACB PC Client for MS-DOS/MS-Windows License:
Q2-GFWA*-**

DEC ACB PC Client for MS-DOS/MS-Windows Update
License: Q2-GFWA*-**

DEC ACB PC Client for MS-DOS/MS-Windows Media and
Documentation:
Q2-GFWAA-HB

Denotes variant fields. For additional information on available licenses, services, and media, refer to the appropriate price   book.

SOFTWARE LICENSING

This software is furnished under the licensing provisions of Digital Equipment Corporation's Terms and Conditions for Reusable Software Products or where appropriate, Standard Terms and Conditions. For more information about Digital's licensing terms and policies, contact your local Digital office.

Licence Management Facility Support.

This layered product supports the OpenVMS License Management Facility.

DEC ACB offers a Traditional license and a Concurrent Use licence.

DEC ACB PC Client offers a Concurrent Use license.

Each Concurrent Use license allows any one individual at a   time to use the layered product. A Traditional license allows   unlimited system use.

SOFTWARE PRODUCT SERVICES

A variety of service options are available from Digital. For more information, contact your local Digital office.

SOFTWARE WARRANTY

A 90 day warranty for this software product is provided by Digital with the purchase of a license for the product.

The above information is valid at time of release. Please contact your local Digital office for the most up-to-date information.