TECHNICAL HANDBOOK FOR

ENVIRONMENTAL HEALTH AND ENGINEERING

VOLUME III - HEALTH CARE FACILITIES DESIGN AND CONSTRUCTION

PART 21 - DESIGN CRITERIA AND STANDARDS

CHAPTER 21-13 COMPUTER-AIDED DESIGN

A. INTRODUCTION

This chapter establishes computer-aided design (CAD) as the Indian Health Service (IHS) guidelines in computer-aided design standard drawings and requirements. The effective use of CAD in architecture, engineering, and facility management depends on sharing graphic information. Floor plan drawings developed by architects need to be available as backgrounds for mechanical and electrical plans. Symbols and details developed for one project need to be reusable for future copies of drawings in electronic form for use in future projects and in ongoing facility management. To realize the benefits of shared graphics in the health care facility design, standards are needed for organizing information in CAD drawings. In particular, a standard approach is needed for the use of CAD layers, the basic method most CAD systems use to group information for display, editing, and plotting purposes.

B. REFERENCE STANDARDS

The standard for all computer-aided design in the IHS will be the <u>"CAD</u> Layer Guidelines Recommended Designations for Architecture, Engineering, and Facility Management Computer-Aided Design."

A copy of the current edition of the <u>CAD Layer Guidelines Recommended</u>
<u>Designations for Architecture, Engineering, and Facility Management</u>
<u>Computer-Aided Design,</u> is included in the IHS Technical Handbook for the Environmental Health and Engineering by **reference only**. Copies are available for a fee from the American Institute of Architects Press, 1735 New York Avenue, North West, Washington D.C. 20006.