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VETERINARY MEDICAL UNIT (VMU)

VA DESIGN GUIDE

Department of Veterans Affairs Veterans Health Administration Office of Construction Management Office of Architecture and Engineering Standards Service 202-565-6455

Preface

The material contained in this Veterinary Medical Unit Design Guide is the culmination of a partnering effort by the Department of Veterans Affairs Veterans Health Administration's Office of Research and Development and Office of Architecture and Engineering. The goal of the Design Guide is to ensure the quality of VA facilities while controlling construction and operating costs.

This document is intended to be used as a guide and a supplement to current technical manuals and other VA criteria in the planning of Veterinary Medical Units. The Design Guide is not to be used as a standard design, and use of this Design Guide does not preclude the need for a functional and physical design program for each specific project, nor the project Architects' and Engineers' responsibilities to develop a complete and accurate project design that best meets the users' needs and applicable code requirements.

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Section 1

Introduction, Credits, Abbreviations, and Legend of Symbols

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Introduction

This document prepared by the Standards Division of the Office of Construction Management is intended to be a graphic consolidation of existing Department of Veterans Affairs standards and criteria. It contains data from the following sources:

- H-08-1 Master Construction Specifications
- H-08-3 Construction Standards
- H-08-4 Standard Details
- H-08-5 Equipment Guide List
- H-08-6 List of Equipment Symbols
- H-08-9 Space Planning Criteria
- H-08-13 Barrier-Free Design Handbook
- H-08-14 Room Finish and Door Hardware Schedule
- Various Technical Criteria pertaining to Architectural, HVAC, Plumbing, and Electrical
- Uniform Federal Accessibility Standards
- Consensus Information from the VMU Task Force
- Program Official VHA

The VA also has other documents outlining design requirements for this facility and these can be found in the Table of Contents of the <u>Design Instructions to</u> <u>Architects and Engineers</u>.

Our purpose is to make the Design Guide USER FRIENDLY, and to serve as an index to these sources when data is either too detailed or too broad to be included in this guide.

The Veterinary Medical Unit Design Guide was developed as a design tool to assist the medical profession in better understanding the choices that designers ask them to make, and to help the designers understand the functional requirements necessary for proper animal care.

The guide plates contained in the VMU Design Guide are intended as illustrations of VA's furniture, equipment and personnel space needs. They are not meant to limit design opportunities. The design guide is <u>not</u> a standard design and should <u>not</u> be used as such.

This Design Guide is not intended to be project specific. While it does contain the vast majority of spaces that now are required in the VMU, it is not possible to encompass all possible future requirements. Therefore, it is recommended that the project-specific space program be the starting point for an individual project design. In addition, it is important to note that the guide plates are a generic graphic representation only. Equipment manufacturers should be consulted for actual dimensions and utility requirements. Use of this design guide does not compromise the project Architects' and Engineers' responsibilities to develop a complete and accurate design that meets the users' needs and appropriate code requirements.

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Abbreviations

AAmperes
ABV Above
AC/HR Air Changes Per Hour
A/E Architect/Engineer
AFF Above Finished Floor
AI Acquisition and Installation
AR As Required
AT Acoustical Ceiling (Tile)
AUTO Automatic
CCContractor Furnished and Installed, Construction Funds
CF Construction Funds, VA Furnished, Installed by VA or Contractor
CFM Cubic Feet per Minute
CLG Ceiling
CMU Concrete Masonry Units (Unit Masonry)
CP Carpet (without cushion broadloom)
CRP Corrosion Resistant Piping
CRS Corrosion Resisting Steel
CT Ceramic Tile
EA Each
EA Exhaust Air

EDE Enoug Designade Flagging
ERFEpoxy Resinous Flooring
EXHExhaust
FFahrenheit
FCFootcandle
FL DRFloor Drain
FLUORFluorescent
GFIGround Fault Interrupter
GWBGypsum Wallboard Systems
HLaboratory for Fume Hoods
H-08-1Master Construction Specifications
H-08-3Construction Standards
H-08-4Standard Details
H-08-5Equipment Guide List
H-08-6Equipment Symbols
H-08-9Space Planning Criteria
H-08-13Barrier Free Design Handbook
H-08-14Room Finishes, Door and Hardware Schedule
HEPAHigh Efficiency Particulate Air
HRHour
HWMedical Washing Equipment and Custom Fabricated Lab Equipment
HZHertz

J	Laboratory Sink
KW	. Kilowatt
LAB	Laboratory
LB	Pound, Pounds
Μ	Laboratory Furniture (Modular)
MCS	Master Construction Specification
MIN	. Minimum
MTD	Mounted
MUA	. Make-up Air
NC	Noise Criteria
NFPA	National Fire Protection Association
NSF	. Net Square Feet
	•
OC	. On Center
OC	. On Center . Plumbing Fixture
OC P	
OC P PCP	Plumbing Fixture
OC P PCP PD	. Plumbing Fixture . Portland Cement Plaster
OC P PCP PD	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor
OC P PCP PD PF PL	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor
OC P PCP PD PF PL PSF	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor . Plaster
OC P PCP PD PF PL PSF	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor . Plaster . Pounds per Square Foot . Pounds per Square Inch, Gauge
OC P PCP PD PF PF PSF PSIG QTY	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor . Plaster . Pounds per Square Foot . Pounds per Square Inch, Gauge
OC P PCP PD PF PF PSF PSIG QTY R	. Plumbing Fixture . Portland Cement Plaster . Pressure Drop . Power Factor . Plaster . Pounds per Square Foot . Pounds per Square Inch, Gauge . Quantity

RH	Relative Humidity
S	Laboratory Sink
SA	Supply Air
SC	High Build Glazed Coating (Special Coating)
SD	Standard Detail
SF	Square Foot, Square Feet
SP	Special Faced
SPDT	Simple Pole Double Throw Electrical Switch
SS	Stainless Steel
Т	Shelving; Mop Racks
V	Volts
VA	Department of Veterans Affairs
VC	VA Furnished Contractor Installed, VHA Funds for Purchase, Construction Funds for Installation
VHA	Veterans Health Administration
VL	Laboratory Furniture (Conventional)
VMU	Veterinary Medical Unit
VP	Veneer Plaster
VS	Sterilizer Equipment
VV	Sterilizer Equipment
VV	Sterilizer Equipment VA Furnished and Installed VHA Appropriation Wallcovering (Vinyl Coated Fabric)

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System	Description of Symbol	.cel Name	Drawing Symbol
Power Receptacles	DUPLEX RECEPTACLE - 20AMP - MOUNTED 18" AFF UNLESS OTHERWISE NOTED	duplex	₩
Πευεριασίες	DUPLEX RECEPTACLEWITH GROUND FAULT INTERRUPTER 20AMP - MOUNTED 18" AFF UNLESS OTHERWISE NOTED	gfidup	⊨⊖ _{GFI}
	WEATHERPROOF DUPLEX RECEPTACLE WITH GFI 20AMP - MOUNTED 18'' AFF UNLESS OTHERWISE NOTED	wprdup	⊨ewp
	QUADRAPLEX OUTLET 20AMP MOUNTED 18'' AFF OR QUADRAPLEX OUTLET 20AMP PEDESTAL MOUNTED	qdplex pdplex	l ⊫⊕
	ELECTRICAL STRIP MOLD 20AMP OUTLETS AT 2'-0'' INTERVALS	plgmld	
	SINGLE RECEPTACLE - 20AMP - ON FLEXIBLE DROP CORD TO HANG 6'-6'' AFF	dropcd	Ŭ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
	RETRACTABLE CORD ON A CEILING MTD. TAKE-UP REEL PROVIDE ONE 20 AMP SIMPLEX OUTLET AT EACH END	retord	
	CLOCK: BATTERY POWERED. "SW" DESIGNATES AN ELECTRIC CLOCK WITH SWEEP SECOND HAND	clokbp cloksw	HC HC _{SW}
Switches	SINGLE POLE SWITCH	sw1pol	Ş
	SINGLE POLE SWITCH-SUFFIX OF "a", "b", "c" INDICATES SEPARATE CONTROL OF FIXTURE(S) WITH SAME DESIGNATION	swspct	S S S
	SWITCH WITH PILOT LIGHT	swpilt	Σ ^ρ
	WEATHERPROOF SWITCH	swwatr	Σ ^{wp}
	TIMER SWITCH WITH OVERRIDE SWITCH FOR SELECTED LIGHTS	switch	ST

Legend of Symbols

System	Description of Symbol	.cel name	Drawing Symbol
Switches	THREE WAY SWITCH	switch	S ₃ a
	FUSED OR UNFUSED DISCONNECT SWITCH	discsw	
	OPERATING LIGHT VARIABLE INTENSITY CONTROL	varsw	
Lighting	1' × 4' FLUORESCENT FIXTURE	lights	
	1' X 4' EMERGENCY FLUORESCENT FIXTURE	lights	
	ONE LAMP VERTICAL EMERGENCY FLUORESCENT FIXTURE USED IN ANIMAL CUBICLES	cubit	
	RECESSED INCANDESCENT FIXTURE (NOMINAL 1' X 1' SQUARE)	radlt	
	CEILING MOUNTED EXAM LIGHT, SINGLE HEAD	lite1	
	CEILING MOUNTED OPERATING LIGHT, DOUBLE HEAD	lite2	
	2'x 4'FLUORESCENT FIXTURE	lights	
	2'X 4'EMERGENCY FLUORESCENT FIXTURE	lights	

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System	Description of Symbol	.cel Name	Drawing Symbol
Telephone	TELEPHONE OUTLET MOUNTED 18'' AFF UNLESS OTHERWISE NOTED	teldsk	\triangleleft
	TELEPHONE OUTLET (WALL TYPE) MOUNTED 54" AFF UNLESS OTHERWISE NOTED	telwal	⊲w
Miscellaneous Communications	COMPUTER TERMINAL OUTLETS - VERIFY EXACT NEEDS PROVIDE SIGNAL OUTLET(S) & POWER OUTLET(S) AS REQ'D.	comput	КŶ
Special Outlets & Receptacles	SPECIAL WALL OR FLOOR OUTLET FLUSH MOUNTED SPECIAL DEVICE AND MOUNTING HEIGHT AS NOTED	spcwal spcfIr	ΗØ
	JUNCTION BOX - PURPOSE AND LOCATION AS NOTED	junwal junclg	0
Mechanical	SUPPLY AIR DIFFUSER	hvac	
	EXHAUST AIR REGISTER OR GRILLE	hvac	
	THERMOSTAT	therm	-T)
Plumbing	COMBINATION FAUCET HOSE BIBB	hoseb	
	GAS, AIR, AND VACUUM OUTLETS	gav	