

## APPENDIX H

**MEDICAL LABORATORY CAPABILITIES****H-1. General**

The medical laboratory capability at Echelon II is extremely limited. This appendix provides information on the medical laboratory capabilities of Echelons II through IV MTFs.

**H-2. Medical Laboratory Capabilities**

Tables H-1 through H-3 depict what laboratory procedures can be accomplished at each echelon of care.

*Table H-1. Medical Laboratory Procedures, Biochemistry*

DESCRIPTION	AREA SUPPORT SQUAD	MASH	CSH	FH	GH
Perform blood gas analysis		X	X	X	X
Perform electrolyte level (Na, K, Cl, CO <sub>2</sub> )		X	X	X	X
Determine total serum protein			X	X	X
Determine serum creatinine			X	X	X
Determine serum amylase			X	X	X
Determine serum AST activity			X	X	X
Determine serum ALT activity			X	X	X
Determine CK level			X	X	X
Determine serum glucose		X	X	X	X
Determine serum urea nitrogen		X	X	X	X
Determine serum T. bilirubin			X	X	X
Determine serum calcium			X	X	X
Determine CSF glucose			X	X	X
Determine CSF protein			X	X	X
Determine urine protein				X	X
Determine urine glucose				X	X

*Table H-2. Medical Laboratory Procedures, Hematology/Urinalysis*

DESCRIPTION	AREA SUPPORT				
	SQUAD	MASH	CSH	FH	GH
Perform white cell count	X	X	X	X	X
Perform CBC (WBC, Hct, Gran ct, % Gran, Plt, Lymph/ Mono ct and %)		X	X	X	X
Determine hematocrit	X	X	X	X	X
Perform WBC differential	X	X	X	X	X
Perform prothrombin time (PT)			X	X	X
Perform partial thromboplastin time (APTT)			X	X	X
Perform CSF count and differential		X	X	X	X
Perform urinalysis (dipstick)	X	X	X	X	X
Perform urinalysis (microscopic)	X	X	X	X	X
Perform platelet estimate	X	X	X	X	X
Perform platelet count			X	X	X
Determine fibrinogen level				X	X
Determine fibrin split products				X	X

*Table H-3. Medical Laboratory Procedures,  
Microbiology/Serology/Blood Bank*

DESCRIPTION	AREA SUPPORT				
	SQUAD	MASH	CSH	FH	GH
Perform occult blood test	X		X	X	X
Perform thick and thin smears for malaria	X		X	X	X
Perform gram stains	X	X	X	X	X
Perform rapid plasma reagin (RPR) (syphilis)			X	X	X
Perform IM (infectious mononucleosis) test			X	X	X
Examine feces for ova, cysts, and parasites			X	X	X
Perform potassium hydroxide (KOH) preparations			X	X	X
Perform pregnancy tests			X	X	X
Perform urine cultures (colony counts and sensitivity)			X*	X	X
Perform wound culture and sensitivity			X*	X	X
Perform blood culture and sensitivity				X	X
Perform sputum culture and sensitivity				X	X
Perform stool culture and sensitivity				X	X
Perform CSF culture and sensitivity				X	X
Perform culture and sensitivity for gonorrhea			X*	X	X
Perform throat cultures			X*	X	X
Perform microscopic exams for acid-fast bacteria				X	X
Identify anaerobes					X
Perform blood group and type (ABO, RH)		X	X	X	X
Perform blood crossmatches			X	X	X
Thaw fresh frozen plasma		X	X	X	X
Platelets concentrates			X	X	X

\*Requires microbiology augmentation set A