

Appendix A. Adult Heparin Protocols at the University Hospital at Downstate

Heparin for Adult Medical/Surgical Patients – Target aPTT 60-80 seconds

(NOT for Stroke or Cardiac Surgery Patients)

Table 1. Initiation of IV Heparin Infusion

LOW Dose Protocol: acute coronary syndrome, atrial fibrillation, concomitant thrombolytic therapy, or therapeutic anticoagulation desired but patient is at a high risk of bleeding due to acute condition, previous history of bleeding

Initial Bolus Dose (Optional)	Initial Infusion Dose
60 units/kg - Round to closest 100 units - Maximum bolus dose of 5,000 units - Bolus dose administered over 3 minutes	12 units/kg/hr - Round to closest 50 units/hr. - Maximum <u>initial</u> rate of 1,000 units/hr - Order defaults to a duration of 24 hours

HIGH Dose Protocol: DVT, PE, mechanical valve replacement

Initial Bolus Dose (Optional)	Initial Infusion Dose
80 units/kg - Round to closest 100 units - Maximum bolus dose of 10,000 units - Bolus dose administered over 3 minutes	18 units/kg/hr - Round to closest 50 units/hr. - Maximum <u>initial</u> rate of 2,000 units/hr - Order defaults to a duration of 24 hours

Table 2. Maintenance Dose Adjustments Based on aPTT Results

aPTT (sec)	Bolus	Maintenance Infusion Dosage Change	Next aPTT After Change
<45	40 units/kg* *Refer table 3 below for bolus dose adjustment	Increase rate by 3 units/kg/hr	6 hours
45-60	NONE	Increase rate by 2 units/kg/hr	6 hours
60-80 (Goal)	NONE	NO CHANGE	6 hours until therapeutic x 2 consecutive values, then q24h
81-90	NONE	Decrease rate by 3 units/kg/hr	6 hours
> 90	NONE	STOP infusion for 2 hours, Then, decrease rate by 3 units/kg/hr	2 hours after infusion resumed

Table 3. Bolus Dose Adjustment (40 units/kg)

Patient Weight (kg)	<60 kg	60-85 kg	85-110 kg	>110 kg
Dose	2,000 units	3,000 units	4,000 units	5,000 units Maximum