

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Abciximab		X	7.2 mg	250 mL NS (D5W)	28.8 mcg/mL	Continuous	6 hrs		12 hrs	Use 0.2 micron in-line filter Hypersensitivity risk
Acetaminophen <i>Doses < 1000 mg</i>	X		Ordered Dose	Straight draw	10 mg/mL	15-30 min	6 hrs		6 hrs	
Acetazolamide <i>IV Push preferred</i>	X		250-500mg <i>Dilute vial: 5 mL SWFI</i>	25mL NS	Varies	15 min	6hrs		12 hrs	IV Push preferred
Acetylcysteine (ACETADOTE) <i>Pt > 40 kg only</i>		X	150 mg/kg	200 mL D5W	Varies	60 min	6 hrs		24 hrs	Incompatible with NS
			50 mg/kg	500 mL D5W		4 hours				
			100 mg/kg	1000 mL D5W		16 hours				
Acyclovir	X		Ordered Dose <i>Dilute vial to 50 mg/mL: 10 mL SWFI (500mg)</i>	NS (D5W) QS to final conc.	≤ 7 mg/mL	60 min	6 hrs		24 hrs (7 day if PFL)	DO NOT REFRIGERATE No bacteriostatic saline Thrombophlebitis risk Hydration essential
Albumin 5%	X		12.5 gram	250 mL premix	0.05 gram/mL	12.5 gram: 90 min	RTU		MFG BUD ⁺	May be diluted in NS
			25 gram	500 mL premix		25 gram: 180 min				
Albumin 25% <i>*preferred*</i>	X		12.5 gram	50 mL premix	0.25 gram/mL	12.5 gram: 60 min				
			25 gram	100 mL premix		25 gram: 90 min				
			Ordered dose	Straight draw		(max: 3 mL/min)				
Alpha-1 Proteinase Inhibitor (PROLASTIN)	X		60 mg/kg <i>Use 20 micron filter during preparation</i>	Reconstitute with supplied device/diluent	Varies	≤0.08 mg/kg/min	3 hrs		3 hrs	DO NOT SHAKE Note: <u>new</u> dose required for weight change ±10lb
Alteplase DRIP <i>Pulmonary embolism</i>		X	100 mg <i>Use supplied transfer device for mixing (attach diluent first)</i>	100 mL <i>Use supplied diluent</i>	1 mg/mL	Over 2 hours then start heparin drip	6 hrs	8 hrs	8 hrs	DO NOT SHAKE Bleeding precautions
Alteplase DRIP <i>Myocardial Infarction</i>		X				See Drug info				
Alteplase DRIP <i>Stroke</i>		X				0.9 mg/kg 10% over 1 min 90% over 60 min				
Alteplase DRIP – <i>Arterial Vascular embolism</i>		X				Continuous 0.12 – 2 mg/hr				DO NOT SHAKE Bleeding precautions
Alteplase <i>Chest Tube Instill</i>			10 mg	NS 40mL & Lidocaine 1% 10mL in 60mL cath-tip syringe	0.17 mg/mL	Instill into chest tube	6 hrs	8 hrs	8 hrs	DO NOT SHAKE

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer
Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;
 \$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Alteplase infusion FOR EKOS <i>Catheter directed therapy</i>		X	25mg (25mL)	250mL NS Total volume	0.1 mg/mL	0.5-2mg/hr (5-20mL/hr)	6 hrs		24 hrs	DO NOT SHAKE Bleeding Precautions
Alteplase (CATHFLO)			Dilute 2 mg vial with 2.2 mL SWFI	N/A	1 mg/mL	Instill into catheter	6 hrs	8 hrs	8 hrs	DO NOT SHAKE
Amifostine (Ethyol)	X		Dilute 500 mg vial: NS 9.7 mL	NS 50 mL Final Conc: 5 - 40 mg/mL	50 mg/mL	Radiation: 5 min Cisplatin: 15 min		24 hr	5 hr	<ul style="list-style-type: none"> • Highly emetogenic. Administer antiemetics prior to amifostine • Infuse 30 minutes prior to chemotherapy (over 15 minutes) • Infuse 15-30 minutes prior to radiation • Monitor blood pressure
	-	-	Dilute 500 mg vial: NS/SWFI: 2.5 mL	N/A	200 mg/mL	SUBQ ONLY		N/A	N/A	
Amikacin	X		Ordered dose (15-20 mg/kg/day)	NS (D5W) ≤1250mg: 250mL >1250mg: 500 mL	Varies (≤ 5 mg/mL)	30 min	6 hrs	14 days	24 hrs	
Aminocaproic Acid	X		5 gram LOAD	250 mL NS (D5W)	20 mg/mL	1 hour	6 hrs		7 days	
			10 grams	500 mL NS (D5W)		1 gram/hr (50 mL/hr) x 8 hrs or until bleeding stops				
Amiodarone LOAD		X	150 mg	100 mL D5W	1.5 mg/mL	10 min	6 hrs -or- RTU		72 hrs (PVC:2hr)	Use DEHP free bags Use 0.2 micron in-line filter Incompatible with NS VESICANT
Amiodarone DRIP		X	450 mg	250 mL D5W total volume	1.8 mg/mL	1mg/min x 6 hrs then 0.5 mg/min x 18hrs	6 hrs		72 hrs	
Aminophylline BOLUS	X		5.7 mg/kg	250 mL D5W	Varies	30 min	6 hrs		48 hrs	VESICANT ≤60 yrs: 0.5 mg/kg/hr >60 yrs: 0.38 mg/kg/hr
Aminophylline DRIP		X	500 mg	500 mL D5W total volume	1 mg/mL	Continuous (Age dependent)				
Amphotericin B deoxycholate	X		0.7-1 mg/kg/day <i>Dilute vial to 5 mg/mL: 10 mL SWFI</i>	D5W QS to final conc.	≤ 0.1 mg/mL	6 hours	6 hrs	7 days PFL	6 hrs PFL	Incompatible with NS Incompatible with heparin No bacteriostatic saline

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Amphotericin B LIPOSOMAL (AMBISOME) **High Alert**	X		3-5 mg/kg/day <i>Dilute vial to 4 mg/mL: 12 mL SWFI Use supplied 5 µ needle.</i>	D5W QS to final conc.	1-2 mg/mL	120 min		7 days PFL	6 hrs	Incompatible with NS Incompatible with heparin No bacteriostatic saline
Ampicillin	X		1 gram	50 mL NS (D5W)	20 mg/mL	30 min	1 hrs	72 hrs	8 hrs 2hrs D5W	
			2 grams	100 mL NS (D5W)						
Ampicillin/sulbactam	X		1.5 grams	50 mL NS (D5W)	30 mg/mL	30 min	6 hrs	72 hrs	8 hrs 2hrs D5W	
			3 grams	100 mL NS (D5W)						
Argatroban - HIT **High Alert**			125 mg	125 mL premix	1 mg/mL	Continuous Titrate	RTU		MFG BUD*	DO NOT DILUTE Protect from light
			250mg	250mL NS (D5W)				72 hrs PFL	72 hrs PFL	
Azithromycin	X		500 mg	250 mL NS (D5W)	2 mg/mL	60 min	6 hrs	7 days	24 hrs	VESICANT (>2 mg/mL)
Aztreonam	X		1 gram	50 mL NS	20 mg/mL	30 min	6 hrs	7 days	48 hrs	Do not refreeze thawed RTU bags
			2 gram							
			RTU bags	50 mL premix	--		RTU	14 day	48 hrs	
Benefix (factor IX recomb)	X		<i>Use supplied diluent/ device; Warm to RT</i>	In Syringe or Empty bag	Varies	Several min via IVP	3 hr		3 hr	
Bivalirudin – HIT **High Alert**		X	250 mg	500 mL NS (D5W)	0.5 mg/mL	Continuous Titrate	6 hrs	24 hrs	24 hrs	0.75 mg/kg bolus then 1.75 mg/kg/hr x 4 hrs then 0.2 mg/kg/hr x 20 hrs
Bivalirudin – PCI **High Alert**		X	250 mg	50 mL NS (D5W)	5 mg/mL	Continuous				
Bumetanide		X	24 hr supply <i>Typical: ≤10 mg/24hr</i>	Straight draw (no dilution)	0.25 mg/mL	Continuous	6 hrs		48 hrs	May dilute 12 mg in 500 mL D5W (0.024 mg/mL)
Calcium CHLORIDE *ICU/ED* *CENTRAL LINE ONLY*	X		1 gram	50 mL NS	0.02 gram/mL	1 gram/hour	6 hrs		24 hrs	VESICANT
			2 grams	100 mL NS						
Calcium GLUCONATE	X		1 gram	50 mL NS (D5W)	0.02 gram/mL	1 gram/hour	6 hrs		24 hrs	VESICANT
			2 grams	100 mL NS (D5W)						

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Cefazolin <i>*Central line required for continuous infusion*</i>	X		1 gram	50 mL D5W (NS)	20 mg/mL	30 min	6 hrs -or- RTU	10 days (9 days if batch)	24 hrs -or- MFG BUD*	RTU: after activation stable in refrigerator for 7 days
			2 grams	-or- 50 mL D5W Premix	40 mg/mL					
			3 grams	100 mL NS (D5W)	30 mg/mL					
		X	4 grams	250 mL NS Total Volume	16 mg/mL	Continuous 10.4 mL/hr	10g: 4hr			
			6 grams	300 mL NS Total Volume	20 mg/mL	Continuous 12.5 mL/hr				
Cefepime	X		1 gram	50 mL D5W (NS)	20 mg/mL	30 min	6 hrs -or- RTU	7 days	24 hrs -or- MFG BUD%	
			2 grams	-or- 50 mL D5W Premix	40 mg/mL					
Cefoxitin	X		1 gram	50 mL D5W (NS)	20 mg/mL	30 min	4 hrs -or- RTU	48 hrs	12 hrs -or- MFG BUD%	
			2 grams	-or- 50 mL D5W Premix	40 mg/mL					
Ceftaroline	X		200 mg	100 mL NS (D5W)	2 mg/mL	60 min	6 hrs	24 hrs	6 hrs	Dilute vial: 20 mL SWFI
			300 mg		3 mg/mL					
			400 mg		4 mg/mL					
			600 mg		6 mg/mL					
Ceftazidime	X		1 gram	50 mL NS (D5W)	20 mg/mL	30 min	6 hrs	3 days	24 hrs	
			2 grams	100 mL NS (D5W)						
Ceftazidime/Avibactam	X		Dilute 2.5gm vial: 10mL SWFI	100 mL NS (D5W)	≤ 25 mg/mL	2 hours	6 hrs	24 hrs	12 hrs	
			0.94 grams= 4.5mL 1.25 grams=6mL							
			2.5 grams							
Ceftolozane/Tazobactam	X		Dilute 1.5gm vial: 10mL SWFI/NS	100 mL NS (D5W)	≤ 15 mg/mL	60 min	6 hrs	7 days	24 hrs	
			150mg = 1.2mL							
			375mg = 2.9mL							
			750mg = 5.7mL 1500mg = 11.4mL							

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer

Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;

\$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

Page 4 of 16

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Ceftriaxone IV	X		1 gram	50 mL D5W (NS)	20 mg/mL	30 min	6 hrs -or- RTU	10 days	48 hrs -or- MFG BUD*	Incompatible with calcium (includes LR solutions)
			2 gram	-or- 50 mL D5W Premix	40 mg/mL					
Ceftriaxone IM	-	-	Varies <i>Dilute with 1% lidocaine to 350 mg/mL</i>	Withdraw ordered dose	350 mg/mL	IM ONLY	6 hrs	3 days	24 hours	Dilution volumes: 500 mg vial: 1 mL 1 gram vial: 2.1 mL 2 gram vial: 4.2 mL
Chlorpromazine	X		Varies	NS to final conc.	≤1mg/mL	Varies Max: 1mg/min	6 hrs		24 hours	
Ciprofloxacin	X		200 mg	100 mL D5W premix	2 mg/mL	60 min	RTU		see comment	BUD: Sagent: 7 days Pfizer: 30days (400mg); 15 days (200mg)
			400 mg	200 mL D5W premix						
Cisatracurium **High Alert** *ICU/ED Only*		X	100mg (50mL of 2mg/mL) (10mL of 10mg/mL)	2mg/mL: straight draw, NO dilution 10mg/mL: 40mL NS (D5W)	2 mg/mL	Continuous Titrate	6 hrs	24 hrs	48 hrs	NO Lactated Ringers Must be ordered w/ sedation drip, eye lubricant, and VTE prophylaxis
Clindamycin	X		600 mg	50 mL premix	12 mg/mL	30 min	RTU		MFG BUD&	
			900 mg		18 mg/mL					
Colistimethate *polymyxin B preferred*	X		1.25-2.5 mg/kg/dose <i>Dilute vial to 75 mg/mL: 2 mL SWFI</i>	100 mL NS (D5W)	Varies	30 min	6 hrs	24 hrs		Max daily dose: 5 mg/kg/day
Cosyntropin *IR Suite – ENDO ONLY*	X		0.25mg	50 mL NS	5 mcg/mL	10mL/hr (50mcg/hr)	6 hrs		12 hrs	IV push preferred in inpatient wards
Dantrolene (RYANODEX) *malignant hyperthermia*			2.5 mg/kg PRN Max: 10 mg/kg	Each vial: 5 mL SWFI	50 mg/mL	IV push	6 hrs		6 hrs	SWFI only. No NS/D5W
Daptomycin (criteria for use) *daptomycin RF preferred*	X		4-6 mg/kg (max: 12 mg/kg) <i>Dilute vial to 50 mg/mL: 10 mL BWFI or SWFI</i>	50 mL NS NS ONLY	Varies	30 min	6 hrs	BWFI: 5 days SWFI: 3 days	BWFI: 48 hrs SWFI: 18 hrs	DO NOT SHAKE

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Deferoxamine	X	-	Dilute 500 mg vial with SWFI 5 mL Conc: 95 mg/mL	NS 250 mL Alternative: D5W; LR; 1/2NS	Varies	SUBQ administered via pump over 8 – 24 hrs IV: See prescribing information	7 days RT;PFL		24 hr	DO NOT REFRIGERATE IM preferred Administer after transfusion complete
	-	-	Dilute 500 mg vial with SWFI 2 mL	N/A	213 mg/mL	IM ONLY		N/A	N/A	
Denosumab (Prolia; Xgeva)	-	-	60 mg 120 mg	Premix Syringe	Prolia: 60 mg/mL Xgeva: 70 mg/mL	SUBQ Warm to RT (~15-30 min) prior to admin	RTU	N/A	14 days PFL	DO NOT HEAT/WARM Monitor Ca ²⁺ levels
Dexamethasone	X		Ordered dose	50 mL NS (D5W)	Varies	30 min	6 hrs	72 hrs	24 hrs	May give IVP undiluted
Dexmedetomidine <i>*ICU/ED Only**</i>		X	400 mcg	100 mL premix	4 mcg/mL	Continuous Titrate	6 hrs		MFG BUD*	
Digoxin Immune Fab <i>*ICU/ED Only*</i>	X		Varies	NS QS to final conc	0.8 mg/mL	30 min	1 hr	4 hrs		
Diltiazem DRIP		X	125 mg	125 mL NS (D5W) Total volume	1 mg/mL	Continuous Titrate	6 hrs	24 hrs	24 hrs	Telemetry required
Diphenhydramine	X		12.5 – 50 mg	50 mL NS	Varies	30 min	6 hrs		24 hrs	May be given IVP undiluted
DoBUTamine <i>*Central line preferred*</i>		X	500 mg	250 mL D5W premix	2 mg/mL	Continuous Titrate	RTU		MFG BUD\$	
DoPamine <i>*Central line preferred*</i>		X	400 mg	250 mL D5W premix	1.6 mg/mL	Continuous Titrate	RTU		MFG BUD\$	VESICANT
Doxycycline	X		100 mg	100 mL NS (D5W)	1 mg/mL	2 hrs	6 hrs	7 days PFL	72 hrs PFL	VESICANT
			200 mg	250 mL NS (D5W)	0.8 mg/mL	3 hrs				
Enalaprilat	X		1.25 mg	25 mL NS (D5W)	0.05 mg/mL	10 min	6 hrs		24 hrs	

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Epinephrine <i>*ICU/ED Only*</i>		X	4 mg	250 mL NS (D5W)	16 mcg/mL	Continuous Titrate	6 hrs	24 hrs PFL	24 hrs PFL	VESICANT
Eptifibatide		X	75 mg	100 mL premix	0.75 mg/mL	Continuous 2 mcg/kg/min	RTU	MFG BUD*		Unopened vials: 2 mo RT 1 mcg/kg/min if ClCr < 50
Ertapenem	X		500 mg <i>Dilute vial: 10 mL SWFI</i>	50 mL NS	10 mg/mL	30 min	6 hrs	72 hrs	24 hrs	Use within 4 hrs of removal from fridge
			1 gram	NS ONLY	20 mg/mL					
Erythromycin	X		250 mg	100 mL NS	2.5 mg/mL	30 min	6 hrs		8 hrs	VESICANT
	X		500 mg	250 mL NS	2 mg/mL					
Esmolol <i>*Central line preferred*</i>		X	2500 mg	250 mL premix	10 mg/mL	Continuous Titrate	RTU		MFG BUD*	Telemetry required
FEIBA (anti-inhibitor coag complex)	X		Varies <i>Round to nearest vial</i>	Dilute with provided SWFI and adapter	Varies	IVP or infusion not to exceed 2 units/kg/min	3 hrs		3 hrs	Dispense in syringe according to package insert
Fenoldopam		X	10 mg	250 mL NS (D5W)	40 mcg/mL	Continuous Titrate	6 hrs		24 hrs	DO NOT Bolus Avoid extravasation
Fentanyl **High Alert**		X	250mcg/25mL OR 550mcg/55mL		10 mcg/mL	Continuous Titrate	6 hrs	9 days	30 hrs	<i>Premix = MFG BUD*</i> 50mcg/mL; 55mL ICU ONLY
			1250mcg/25mL OR 2750mcg/55mL		50 mcg/mL					
Ferric Gluconate (FERRLECIT)	X		125 mg	100 mL NS	1.25 mg/mL	60 min	6 hrs		1 hr	
Fluconazole	X		100 mg	50 mL NS premix	2 mg/mL	60 min	RTU		see comment	BUD: Baxter: 30days Pfizer/Hospira: 24 hours
			200 mg	100 mL NS premix		120 min				
			400 mg	200 mL NS premix						
Folic Acid	X		1-5 mg	50 mL NS (D5W)	Varies	30 min	6 hrs		24 hrs	Banana Bag BUD: 24hrs
Fomepizole	X		Ordered dose (10 - 15mg/kg)	100 mL NS (D5W)	Varies	30 min	6 hrs		24 hrs	
Fosaprepitant		X	Dilute 150 mg vial to 30 mg/mL: NS 5 mL <i>Direct diluent down side of vial slowly</i>	NS 245 mL	1 mg/mL	30 min	24 hr RT		24 hrs	DO NOT SHAKE Incompatible with LR Phlebitis risk

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer
Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;
 \$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

Page 7 of 16

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Foscarnet	X		Varies	Periph.: NS (D5W) QS to final conc. Central: undiluted	Peripheral: 12 mg/mL Central: 24 mg/mL	2 hours	6 hrs	14 days	72 hrs MFD BUD*	
Fosphenytoin 50 mg PE/mL	X		Varies	NS (D5W) QS to final conc	1.5-25 PE/mL	≤ 6 mL/min (≤150 mg PE/min)	6 hrs	48 hrs	48 hrs	PE = phenytoin equivalent
Furosemide DRIP		X	100 mg	50 mL NS Total Volume	2 mg/mL	Continuous	6 hrs		24 hrs PFL	DO NOT REFRIGERATE
Furosemide intermittent	X		Varies	NS (QS to final conc)	1-2 mg/mL	≤ 4 mg/min				
Gentamicin	X		Varies	100 mL NS (D5W)	Varies	30 min	6 hrs	48 hrs	24 hrs	
Glucagon *ICU/ED Only*		X	10 mg	100 mL D5W (NS) Total Volume	0.1 mg/mL	Continuous	6 hrs		24 hrs	For beta-blocker reversal May precipitate with NS
Glucarpidase (Voraxaze)	X		Dilute 1000 unit vial with NS 1 mL	N/A	1000 unit/mL	IV over 5 min	4 hr REF	N/A	N/A	DO NOT SHAKE
Heparin **High Alert**		X	12,500 units 25,000 units	250 mL premix 500 mL premix	50 units/mL	Continuous Titrate	RTU		MFG BUD#	
Hydrocortisone NA succinate	X		Doses > 100 mg	NS (D5W) QS to final con	≤ 1 mg/mL	30 min	6 hrs		72 hrs	Doses ≤100mg give IVP over 30 sec
		X	200 mg	250 mL NS (D5W)	0.8 mg/mL	Continuous 10.4 mL/hour				For septic shock
Hydromorphone **High Alert**		X	5 mg	25 mL	0.2 mg/mL	Continuous Titrate	6 hrs	9 days	30 hrs	<i>Premix = MFG BUD*</i> Concentrated reserved for palliative care patients
		X	30 mg	30 mL	1 mg/mL		6 hrs			
Ibutilide	X		1 mg (< 60 kg: 0.01 mg/kg)	50 mL NS (D5W)	≤20 mcg/mL	10 min (via Alaris or IVP)	6 hrs	48 hrs	24 hrs	Telemetry required during and for 4 hours after dose
Idarucizumab (PRAXBIND)	X		2.5 gram (dose = 5 grams)	50 mL premix	50 mg/mL	10 min per vial	1 hr		1 hr	

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Imipenem-cilastatin	X		250 mg	100 mL NS	2.5 mg/mL	30 min	6 hrs	24 hrs	4 hrs	Rinse vials completely
			500 mg		5 mg/mL	60 min				
			1000 mg	250 mL NS	4 mg/mL					
Insulin (regular) **High Alert*		X	100 units	100 mL NS Total Volume	1 unit/mL	Continuous Titrate	28 d	24 hrs	24 hrs	Use non-PVC bag
Intralipid 20% Fat Emulsion		X	250mL	250mL	20%	12 hours	N/A		MFG BUD*	
Iron Dextran	X		TEST DOSE 0.5mL (25mg)	9.5 mL NS	2.5 mg/mL	IV PUSH over 1-2 min	6 hrs		24 hours	Must be given prior to first infusion dose
			Varies	250-500 mL NS	Varies	2-6 hours				Avoid D5W – inc phlebitis
Iron Sucrose	X		<100 mg	100 mL NS	< 1 mg/mL	30 min	6 hrs		7 days	Hypersensitivity warning Doses ≤200 mg may be given IVP undiluted over 2- 5 min
			100 mg	100 mL NS	1 mg/mL	30 min				
			200 mg	150 mL NS	1.3 mg/mL	60 min				
			300 mg	250 mL NS	1.2 mg/mL	90 min				
			400 mg	250 mL NS	1.6 mg/mL	2.5 hrs				
			500 mg	250 mL NS	2 mg/mL	4 hrs				
Isoproterenol		X	1 mg	250 mL NS (D5W)	4 mcg/mL	Continuous Titrate	6 hrs		24 hrs	
IVIG (GAMUNEX-C preferred)	X		Varies Round to nearest vial	*Send whole vials unless otherwise specified* Straight Draw	100 mg/mL	1 mg/kg/min x 30 min. If tolerated, advance by 1 mg/kg/min every 30 min to a max of 8 mg/kg/min	4 hrs		MFG BUD^	DO NOT SHAKE Do not mix brands May dilute in D5W only Filtration not required
Ketamine		X	100 mg	100 mL NS (D5W)	1 mg/mL	Continuous Titrate	6 hrs		48 hrs	
Labetalol		X	200 mg	200 mL NS (D5W)	1 mg/mL	Continuous Titrate	28 d	24 hrs	24 hrs	Do not mix with NaBicarb
Leucovorin (folinic acid)	X		Dilute vial per package insert to 20 mg/mL -or- Premix 10 mg/mL	D5W 100-500 mL Use D5W if infusing with oxaliplatin Alternative: NS	Varies	IVP to 2 hrs Follow regimen for rate Max rate: 160 mg/min	24 hr RT	72 hr PFL	24 hr	Max syringe volume: 22.5 mL in 30 mL syringe

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Levetiracetam	X		Varies (250 – 2000 mg)	100 or 250 mL NS (D5W)	Varies (≤ 15 mg/mL)	15 min	6 hrs		24 hrs	Premix = MFG BUD*
Levofloxacin	X		250 mg	50 mL D5W premix	5 mg/mL	60 min	RTU		MFG BUD [§]	
			500 mg	100 mL D5W premix		90 min				
			750 mg	150 mL D5W premix						
Levothyroxine	X		Varies (≤70% of PO)	5 mL NS	20 mcg/mL	IV push	4 hrs		4 hrs	
Levothyroxine DRIP (TRANSLIFE ONLY)		X	400 mcg	500 mL NS	0.8 mcg/mL	Continuous Titrate	4 hrs		24 hrs	Range: 12.5 - 37.5mL/hour
Lidocaine		X	2000 mg	500 mL D5W premix	4 mg/mL	Continuous	RTU		MFG BUD [#]	May dilute in NS (not RTU)
Linezolid	X		600 mg	300 mL premix	2 mg/mL	60 min	RTU		MFG BUD [#]	
Lorazepam ***High Alert*** <i>ICU/ED Only*</i>		X	40 mg	40 mL NS (D5W)	1 mg/mL	Continuous Titrate	6 hrs		48 hrs	DO NOT SHAKE
Magnesium sulfate	X		1 gram	100 mL premix	20 mg/mL	60 min	6 hrs		Premix: MFG BUD [#] IV room: 24hr	*infusion clinic: 4gm/2hrs*
			2 grams	50 mL premix	40 mg/mL	2 hrs	RTU			
			4 grams	100 mL premix		4 hrs				
Mannitol 20%			Check for crystallization	50gm/250mL premix 100gm/500mL premix	200 mg/mL	60-120 min	RTU		MFG BUD*	Use 0.22 micron in-line filter
Mannitol 25%	X			0.25 – 1.5 gram/kg	12.5gm/50mL premix		250 mg/mL	RTU		MFG BUD ^{&}
Meropenem	X		500 mg	100 mL NS	5 mg/mL	30 min	3 hrs	24 hrs	4 hr	No Dextrose (poor stability)
			1000 mg		10 mg/mL					
			2000 mg		20 mg/mL					
Mesna	X		Premix (1 gram) -OR- 100 mg/mL	NS 100 mL 12-24 hr infusion: NS 500 mL <i>Alternative: D5W</i>	Varies	15 min	8 days		30 hr	Incompatible with cyclophosphamide

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Methylprednisolone NA succ <i>*Doses > 125 mg*</i>	X		Varies	NS (D5W) QS to final conc	≤ 5 mg/mL	60 min	6 hrs		24 hrs	Doses ≤ 125 mg: give IVP D5W stability: 8 hrs
Methylprednisolone NA succ (TRANSLIFE ONLY)	X		2000mg LOAD	250mL NS	8mg/mL	60 min	6 hrs			
			10-15 mg/kg	100mL NS	Varies					
Metoclopramide	X		5 – 20mg	50 mL NS	Varies	15 min	6 hrs		24 hrs	IV PUSH preferred
Metronidazole	X		250 mg	50 mL of premix sln	5 mg/mL	30-60 min	6 hrs		24 hrs	DO NOT REFRIGERATE Protect from Light
			500 mg	100 mL NS premix			RTU		MFG BUD [#]	
			1000 mg	200 mL of premix sln			6 hrs		24 hrs	
Micafungin	X		50 mg	100 mL NS (D5W)	0.5 mg/mL	60 min	6 hrs		48 hrs PFL	Dilute vial: 5 mL NS DO NOT REFRIGERATE
			100 mg		1 mg/mL					
			150 mg		1.5 mg/mL					
Midazolam DRIP **High Alert* *ICU/ED Only*		X	30 mg 55 mg	30 mL 55 mL	1 mg/mL	Continuous Titrate	6 hrs	7 days	30 hrs	Premix = MFG BUD*
Milrinone DRIP		X	20 mg	100 mL premix	0.2 mg/mL	Continuous	RTU		MFG BUD [#]	
Minocycline	X		100 mg	100 mL NS	1 mg/mL	60 min	1 hr		24 hrs	
			200 mg		2 mg/mL					
Morphine DRIP **High Alert**		X	30 mg/30mL OR 50 mg/50mL		1 mg/mL	Continuous Titrate	6 hrs	9 days	30 hrs	Premix = MFG BUD*
			250 mg	50 mL	5 mg/mL					
Moxifloxacin	X		400 mg	250 mL NS premix	1.6 mg/mL	60 min	RTU		MFG BUD*	
Nafcillin <i>*Central line required for continuous infusion*</i>	X		2 grams	100 mL NS (D5W)	20 mg/mL	60 min	6 hrs	4 days	24 hrs	VESICANT
		X	12 grams	500 mL NS Total Volume	24 mg/mL	Continuous 21 mL/hr				
Naloxone <i>Opioid Reversal</i>		X	2 mg	500 mL NS (D5W) Total Volume	0.004 mg/mL	Continuous	6 hrs		24 hrs	Start infusion at 2/3 of IV bolus dose
Natalizumab <i>*special handling*</i>	X		300 mg	100 mL NS NO D5W	3 mg/mL	60 min	6 hrs	8 hrs	1 hr	DO NOT SHAKE Hypersensitivity risk

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer
Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;
 \$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Nesiritide		X	1.5 mg <i>Dilute vial: 5 mL NS Use fluid from bag</i>	250 mL NS (D5W) Total Volume	6 mcg/mL	Continuous 0.01 mcg/kg/min	6 hrs	24 hrs	24hrs	DO NOT SHAKE
Nicardipine <i>Central line recommended</i>		X	40 mg	200 mL premix	0.2 mg/mL	Continuous Titrate	RTU		MFG BUD*	Avoid extravasation Protect from light
Nitroglycerin		X	50 mg	250mL D5W premix	0.2 mg/mL	Continuous Titrate	RTU		MFG BUD*	0.4 mg/mL preferred
			100 mg		0.4 mg/mL					
Nitroprusside		X	50 mg <i>Dilute vial: 3 mL D5W</i>	250 mL D5W <i>NO NS</i>	0.2 mg/mL	Continuous Titrate	4 hrs		24 hrs PFL	<i>Use black opaque bag Discard bag if green, red, orange, dark brown, blue</i>
Norepinephrine <i>*ICU/ED Only*</i>		X	8 mg	250 mL D5W (NS)	32 mcg/mL	Continuous Titrate	6 hrs		24 hrs	VESICANT
			16 mg		64 mcg/mL					
			32mg	500 mL D5W (NS)						
Novoseven (activated factor VII)	X		Varies <i>Round to nearest vial Dilute vial per package insert</i>	<i>Dilute with supplied histidine diluent ONLY</i>	Varies	IVP over 2-5min <i>*dispense in 10mL syringe*</i>	3 hrs	3 hrs	3 hrs	
Octreotide	X	X	50-100 mcg	100 mL NS (D5W)	1 mcg/mL	30 min	6 hrs		48 hrs	Refrigerate until use
			500 mcg		5 mcg/mL	Continuous 50mcg/hr				
Ondansetron	X		Doses >8 mg	50 mL NS (D5W)	Varies	15 min	6 hrs	7 days	48 hrs	Doses ≤8mg: give undiluted IVP over 2-5 min
Pamidronate	X		30 mg	500 mL NS (D5W)	0.06 mg/mL	90 min	6 hrs		24 hrs	Incompatible with calcium (including LR solution)
			60 mg		0.12 mg/mL	120 min				
			90 mg		0.18 mg/mL					
Pantoprazole INTERMITTENT	X		40 mg	100 mL NS (D5W)	0.4 mg/mL	15 min	6 hrs		48 hrs	Reconstitute vial with NS
Pantoprazole BOLUS	X	80 mg	100 mL NS (D5W)	0.8 mg/mL	15 min					
Pantoprazole DRIP		80 mg	100 mL NS (D5W) Total Volume		Continuous 10 mL/hr					

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Penicillin G (Pen G K preferred for treatment; Na ok in allergy clinic) <i>*Central line req for continuous infusion*</i>	X		4 mill. Units	100 mL D5W	8,000 units/mL	1 hour	6 hrs	7 days	24 hrs	<i>Dilute vial to 500,000 units/mL: 8 mL NS</i> Hypersensitivity risk Alaris: 1 unit = 1 Mill. Unit
			3 mill. Units		6,000 units/mL					
			2 mill. Units		4,000 units/mL					
		X	18 mill. Units	500 mL D5W Total Volume	36,000 units/mL	Continuous 20.8 mL/hr				
			24 mill. Units		48,000 units/mL					
Pentobarbital LOAD	X		5 – 15 mg/kg	100 mL NS (D5W)	Varies	30-60 min (≤25 mg/min)	6 hrs		24 hrs	Ventilator support required Avoid extravasation
Pentobarbital DRIP <i>*ICU/ED Only*</i>		X	1 gram	250 mL NS (D5W)	4 mg/mL	Continuous Titrate				
Phenylephrine DRIP <i>*ICU/ED Only*</i>		X	100 mg	250 mL NS (D5W)	400 mcg/mL	Continuous Titrate	4 hrs	24 hrs	24 hrs	Central line preferred VESICANT
Phenytoin **High Alert**	X		Varies	NS ONLY (<i>NO D5W</i>) QS to final conc	≥ 5 mg/mL	≤ 50 mg/min (Elderly: ≤25)	4 hrs		4 hrs	VESICANT Use 0.2 micron in-line filter
Phytonadione (VIT K)	X		10 mg	50 mL NS (D5W)	0.2 mg/mL	30 min	1 hr		1 hr	Protect from light
Piperacillin/tazobactam	X		2.25 grams	50 mL NS (D5W)	45 mg/mL	30 min	6 hrs	7 days	24 hrs	
			3.375 grams	100 mL NS (D5W)	33.75 mg/mL					
			4.5 grams		45 mg/mL					
Polymyxin B	X		25,000 units/kg/day	250 mL NS (D5W)	Varies	2 hr	6 hrs	72 hrs	24 hrs	
Posaconazole <i>Central line required</i>	X		300 mg	150 mL NS (D5W)	2 mg/mL	90 min	6 hrs	24 hrs	1hr	Use 0.2 micron in-line filter
Potassium Chloride	X		10 mEq	100 mL premix	0.1 mEq/mL	60 min	RTU		MFG BUD	Max rate: 10 mEq/hr (ICU: max 20 mEq/hr)
			20 mEq		0.2 mEq/mL	120 min				
			20 mEq	50 mL premix	0.4 mEq/mL	60 min				20 mEq/50 mL: ICU ONLY
Potassium Phosphate <i>*~ 1.5 mEq K per mMol phos*</i>	X		9 mMol	250 mL NS (D5W)	0.036 mMol/mL	9 and 15mmol: 3 hours	6 hrs		24 hrs	Use 0.2 micron in-line filter VESICANT (K > 40 mEq/L)
			15 mMol		0.06 mMol/mL					
			21 mMol	<i>Use filter to REMOVE Kphos from vial.</i>	0.084 mMol/mL	21 and 30 mmol: 6 hours				
			30 mMol		0.12 mMol/mL					

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer

Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;

\$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

Page 13 of 16

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Procainamide <i>*ICU/ED Only*</i>		X	1 gram	250 mL D5W (NS) Total Volume	4 mg/mL	Continuous	6 hrs		24 hrs	
Prochlorperazine	X		2.5 – 10 mg	50 mL	Varies	15 min	6 hrs		24 hrs	IV push preferred
Promethazine			6.25 – 50 mg	50 mL	≤ 25 mg/mL	15 min	6 hrs		24 hrs	
Propofol **High Alert** <i>*ICU/ED Only*</i>		X	1 gram	100 mL premix	10 mg/mL	Continuous Titrate	6 hrs		MFG BUD%	Change infusion and tubing every 12 hours
Protamine	X		1 mg per 100 units of heparin Max = 50 mg	Straight draw (no dilution)	10 mg/mL	15 min	6 hrs		MFG BUD&	May dilute in NS/D5W Rapid infusion can cause anaphylaxis
Prothrombin Complex Human (KCENTRA)	X		500 unit kit <i>Provided diluent 20 mL</i>	Empty sterile bag	20-31 units/mL	30 minutes MAX: 8.4 mL/min	4 hr		4 hr	Dosed per protocol/INR based on Factor IX units (25, 35, or 50 units/kg) Give with vitamin K
			1000 unit kit <i>Provided diluent 40 mL</i>							
Quinidine gluconate LOAD <i>*ICU/ED Only*</i>	X		10 mg/kg	250 mL NS	Varies	2 hrs	6 hrs	48 hrs	24 hrs	For Malaria treatment Requires telemetry, baseline EKG and Accuchecks q6h
Quinidine gluconate DRIP <i>*ICU/ED Only*</i>		X	800 mg	NS QS to 100 mL Total Volume	8 mg/mL	Continuous 0.02 mg/kg/min				
Ranitidine <i>*if famotidine shortage*</i>	X		50 mg	100 mL NS	≤0.5 mg/mL	15 min	6 hrs	10 days	48 hrs	
Rasburicase	X		Round per policy	50 mL NS total volume	Varies	30 min	6 hrs	24 hrs		DO NOT SHAKE
Reteplase			10 units <i>(Dilute vial: 10 mL SWFI supplied in kit)</i>	10 mL SWFI <i>(note: 0.7 mL overflow in vial after dilution)</i>	1 unit/mL	2 minutes	4 hrs		4 hrs	Incompatible with heparin
Rifampin	X		300 mg <i>Dilute 600 mg vial: 10 mL SWFI</i>	100 mL NS (D5W)	3 mg/mL	30 min	6 hrs		24 hrs	
			600 mg		6 mg/mL				If D5W: 4hrs	
Rocuronium DRIP **High Alert** <i>*ICU/ED Only*</i>		X	200 mg Straight draw	20mL Place in empty bag	10 mg/mL	Continuous Titrate	28 days		24 hrs	Must be ordered with sedation, eye lubricant, and VTE prophylaxis

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer

Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;

\$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

Page 14 of 16

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
RomiPLOstim (Nplate)	-	-	Dilute vial: SWFI 250 mcg: 0.72 mL 500 mcg: 1.2 mL	N/A	500 mcg/mL	SUBQ ONLY <i>Use syringe with 0.01 mL graduations</i>	24 hr	N/A	N/A	DO NOT SHAKE
Sinacalide	X		0.02 mcg/kg	50 mL NS	Varies	60 min	6 hrs		8 hrs	May give IVP
Sodium BICARBonate		X	50 mEq (50 mL)	1000 mL D5W	0.05 mEq/mL	Varies (max: 50 mEq/hr)	6 hr	48 hr	24 hr	150 mEq approximates NS
			100 mEq (100 mL)		0.1 mEq/mL					ABSOLUTE MINIMUM bicarb that should ever be added to sterile water is 75 mEq (approximates ½ NS)
			150 mEq (150 mL)	(1000 mL sterile water OK if greater than 75 mEq)	0.15 mEq/mL					
Sodium PHOSPHATE	X		9 mMol	250 mL NS <i>Use filter to REMOVE Naphos from vial.</i>	0.036 mMol/mL	9 and 15mmol: 3 hours	6 hrs		24 hrs	Use 0.2 micron in-line filter <i>*Glycophos = 1 mMol/mL*</i>
			15 mMol		0.06 mMol/mL					
			21 mMol		0.084 mMol/mL	21 and 30 mmol: 6 hours				
			30 mMol		0.12 mMol/mL					
Sodium thiosulfate	X		12.5 grams	50 mL NS premix	0.25 gram/mL	30 min	RTU		MFG BUD&	Avoid extravasation
Sulfamethoxazole/trimethopr im <i>Conc = 16 mg TMP/mL</i>	X		Varies – based on TMP/kg	125mL D5W per 80mg (5mL) TMP Fluid restrict: 75mL D5W per 80mg (5mL) TMP	Varies	1 hr	6 hrs		6 hrs <i>2hrs if fluid rest.</i>	DO NOT REFRIGERATE
Thiamine	X		100mg - 500mg	100 mL NS (D5W)	1-5 mg/mL	30 min	6 hrs		24 hrs	Banana Bag BUD: 24hrs
Ticarcillin/clavulanate	X		2 gram <i>Dilute 3.1 gram vial: 13 mL NS/SWFI</i>	50 mL NS (D5W)	40 mg/mL	30 min	6 hrs	72 hrs	24 hrs	High sodium load Thrombophlebitis risk
			3.1 gram	100 mL NS (DW)	31 mg/mL					
Tigecycline	X		50 mg	100 mL NS (D5W)	0.5 mg/mL	30 min	6 hrs	48 hrs	24 hrs	<i>Reconstitute vial: 5.3 mL NS</i>
			100 mg		1 mg/mL					
Tirofiban		X	12.5 mg	250 mL NS premix	50 mcg/mL	Continuous	RTU		MFG BUD*	

I=intermittent; C=continuous; BUD=Beyond Use Date; REF=refrigeration; RT=room temperature; SWFI=sterile water for injection; BWFI: bacteriostatic water for injection; RTU=ready to use; MFG = manufacturer

Premix products: *BUD 24 hrs after opened/activated; **BUD 14 days after wrap opened; #BUD 30 days after wrap opened; ^BUD 8 hrs after opened/transferred;

\$BUD 7 days after wrap opened; &BUD 6 hrs after opened; %BUD 12 hours after opened; +BUD 4 hrs after opened

vAug2018-BF

Page 15 of 16

OVAMC Pharmacy Services - Intravenous Medication Dilution Chart (non-hazardous)



Drug	I	C	Drug Amount	Fluid/Volume Default (Alt)	Final Conc.	Infuse Over	VIAL BUD	BUD REF	BUD RT	Comments
Tobramycin	X		Varies	100 mL NS (D5W)	Varies	30 min	6 hrs	96 hrs	24 hrs	
Tranexamic Acid	X		Varies (Typical: 1000mg)	100 mL NS	Varies	30 min	6 hrs		4 hrs	
Valproate sodium	X		SEE HAZARDOUS MEDICATION DILUTION CHART							
Vancomycin	X		500 mg	100 mL NS (D5W)	≤ 5 mg/mL	SEE DOSING PROTOCOL FOR INFUSION TIMES (≤ 1 gram/hour)	6 hrs	14 days (9 days if batch)	7 days	Avoid extravasation
			750-1250 mg	250 mL NS (D5W)						
			1500-2500 mg	500 mL NS (D5W)						
			2750-3000 mg	600 mL NS (D5W)						
			4000 mg	800 mL NS (D5W)						
			5000 mg	1000 mL NS (D5W)						
Vasopressin DRIP <i>Central line recommended</i>		X	40 units	100 mL NS (D5W) Total Volume	0.4 units/mL	Continuous <i>Translife Only: Titrate</i>	6 hrs		24 hrs	Avoid extravasation
Vecuronium DRIP **High Alert** *ICU/ED Only*		X	50 mg	50 mL NS (D5W)	1 mg/mL	Continuous Titrate	6 hrs	24 hrs	24 hrs	Must be ordered with sedation, eye lubricant, and VTE prophylaxis
Voriconazole	X		4-6 mg/kg <i>Dilute vial: 19 mL SWFI</i>	NS 250-500mL <i>Withdraw volume equal to drug amount from bag</i>	0.5-5 mg/mL	2 hrs Max: 3 mg/kg/hr	6 hrs	72 hrs	24 hrs	
Wilate (factor VIII/Von Willebrand Factor, human)	X		<i>Use supplied diluent/ device; Warm to RT</i>	In Syringe or Empty bag	Varies	2-4 mL/min	3 hr		3 hr	

Compounding special concentrations of sodium chloride

Final Product	Base Product	23.4% Sodium chloride Volume (4 mEq/mL)
0.225% Sodium Chloride 1000 mL (38.5 mEq)	Sterile water 1000 mL (0 mEq)	9.6 mL (38.5 mEq)
1.5% Sodium Chloride 1000 mL (231 mEq)	0.9% Sodium Chloride 1000 mL (154 mEq)	19.25 mL (77 mEq)