

Section G: PREOPERATIVE MEDICATIONS

Section Intent: Medications are time sensitive and should reflect currently prescribed medications. Intent is to capture relevant current or long-term pharmacological disease management as close to the surgical procedure as possible. This does not include one time administration of medications due to pathway guidelines or procedural preparation. This list includes the more common category drugs, but is not meant to be an all inclusive list. Please refer to your Institutional Pharmacy Formulary for specific pharmacological products used at individual sites.

Sequence #	Date Field Name	Category Function	Brand/Trade Name	Generic Name
890	Meds-Beta Blockers. Within 24 hours preceding surgery.	<p>The primary action of Beta Blockers are their cardiac effects. Its pharmacological effect is to increase contractility of the heart muscle, reduce heart rate. Beta blockers have been proven to increase survival in cardiac patients.</p> <p>Used for the treatment of:</p> <ol style="list-style-type: none"> 1. high blood pressure, 2. treating chest pain or angina 3. controlling irregular heart rhythms 4. slowing ventricular rate response 5. treating congestive heart failure <p>“Preoperative beta-blocker use and mortality and morbidity following CABG surgery in North America.” Ferguson TB Jr, Coombs LP, Peterson ED; The Society of Thoracic Surgeons National Adult Cardiac Surgery Database. JAMA 2002 May 1;287(17):2221-7</p>	Betapace Blocadren Brevibloc Cartrol, Ocupress Coreg Corgard Corzide Inderal/Inderal LA Kerlone Labetalol Lopressor, Toprol XL Levatol Monitan, Sektal Normodyne, Trandate Oxprenolol Tenoretic Tenormin Timolide Toprol Visken Zebeta	Sotalol Timolol Maleate Esmolol Carteolol Carvedilol Nadolol Propranolol Betaxolol Labetalol Metoprolol Penbutolol Acebutolol Labetalol HCL Atenolol, Chlorthalidone Atenolol Timolol Metoprolol Pindolol Bisoprolol

Sequence #	Date Field Name	Category Function	Trade Name	Generic Name
900	Meds-Ace Inhibitors Within 24 hours. preceding surgery.	<p>Identify if patient had been administered Ace-inhibitor medication within 24 hours of the surgical procedure.</p> <p>Primary use is for the treatment of hypertension but is also an essential treatment for congestive heart failure (reduces the workload of the heart).</p> <p>The drug action is to inhibit the release of the hormone angiotensin II that constricts blood vessels causing an increase in blood pressure. Therefore, blood vessels dilate to increase systemic blood flow to the heart.</p> <p>Some Ace-Inhibitors have additional diuretic components to increase the elimination of excess fluid.</p> <p>DO NOT include ARB medications (Angiotension II Receptor Blockers): e.g., losartan (Cozaar, Hyzaar), valsartan (Diovan), candesartan (Atacand), irbesartan (Avapro, Avalide).</p>	<p>Accupril Accuretic Aceon Altace</p> <p>Capoten/Capozide</p> <p>Lexxel Lotensin Lotrel Mavik</p> <p>Monopril Prinzide Prinivil/Zestril</p> <p>Univasc Uniretic Vaseretic Vasotec Zestoretic</p>	<p>Quinapril Quinapril Hydrochloride Perindopril Erbumine Ramipril</p> <p>Captopril/Captopril HCTZ</p> <p>Enalapril, Felodipine Benazepril/Amlodipine Amlodipine/Benazepril Hydrochloride Trandolapril</p> <p>Fosinopril Zestoretic/Lisinopril Lisinopril</p> <p>Moexipril Hydrochloride Moexipril Hydrochloride Enalapril Maleate Hydrochlorothiazide Enalapril Maleate Lisinopril/Prinivil</p>
910	Meds-Nitrates-I.V. Within 24 hours preceding surgery.	Nitrates act by increasing dilatation of the coronary arteries, thereby increasing blood flow to the myocardial and decreasing myocardial ischemic changes.	Nitroglycerin	
930	Meds-Anticoagulants. Within 48 hours preceding surgery.	Inhibits platelet aggregation, used for the treatment and prevention of the formation of blood clots. Increases the viscosity of the blood cells.	<p>Agratroban Coumadin Lovenox/Low molecular weight Heparin Refludan</p>	<p>Agratroban Warfarin Enoxaparin</p> <p>Heparin Lepirudin</p>

Sequence #	Date Field Name	Category Function	Trade Name	Generic Name
940	Meds-Anticoagulant – Medication Name.	Select the name of the anticoagulant medication the patient had within 48 hours of surgery. These do not include the IIB IIIA inhibitors (see 1030/1040).. Select from the above list (seq # 930).		
950	Meds – Coumadin Within 24 hours preceding surgery.	Indicate if the patient has had Coumadin (Warfarin) within 24 hours. Action is to prevent modification of vitamin K dependent factors (II, VII, IX, X).	Coumadin	Warfarin
970	Meds-inotropes Within 48 hours preceding surgery.	Inotropic agent actions are at the cellular level, increasing intracellular calcium. The primary result is an affect on various aspects of the cardiovascular system. Cardiovascular affects range from increasing or decreasing the heart rate, force of the heart muscle to contract, peripheral or extremity arterial or venous constriction. The force with which these systems are affected are dose dependent. As well, these drugs may lose their cardiovascular affect causing a negative response at higher dosing levels. Initiation of these drugs typically represents some hemodynamic instability in the patient. The chart below represents the various affects each drug has on each system with the degree of intensity represented by a + sign. (+ = mild, ++++ = intensive response). Identify the agonist (agent) and then the intensity it has on each receptor site. This is offered as an educational tool and opportunity to understand what may be observed clinically in relationship to the pharmacological therapies utilized.	Amrinone Dobutamine Dopamine Epinephrine Isopril Metaraminol Milrinone Neosynephrine Norepinephrine	Inocor Dobutrex Dobutrex Adrenalin/Epinephrine Isoproterenol Aramine Primacor Phenylephrine Levophed

Receptor Site	Heart	Systemic Arteries	Pulmonary Arteries	Veins	Agonist	Alpha ₁	Beta ₁	Beta ₂	D ₁ dopamine	D ₂ dopamine
Alpha ₁	0	↑ Constriction (+++)	↑ Constriction (+++)	↑ Constriction (+++)	Epinephrine	++++	+++	++	0	0
Beta ₁	↑ Rate (++) ↑ Contractility (+++) ↑ Artioventricular conduction (+++)	0	↑ Constriction	0	Norepinephrine	+++	+++	0	0	0
Beta ₂	? ↑ Rate ? ↑ Contractility	Dilatation (++)	Dilatation (+)	Dilatation (++)	Isoproterenol	0	++++	++++	0	0
D ₁ dopamine	0	Dilatation (++)	Dilatation (++)	0	Dopamine	++	+++	0	++++	++++
D ₂ dopamine	↓ Rate	Dilatation	?	?	Dobutamine	0	++++	++	0	0
					Ibopamine	+	+	+	++	++
					Fenoldopam	0	0	0	++	0
					Dopexamine	0	+	++++	+++	+++
					Propylbutyldopamine	+	0	0	++	++++

Sequence #	Date Field Name	Category Function	Brand/Trade Name	Generic Name
980	Meds – Steroids. Within 24 hours preceding surgery.	Systemic delivery only; does not include topical or inhaler specific medications or nasal sprays. Does not include one time dose as part of clinical pathway guideline or procedure/surgical preparatory order.	Florinef Acetate Medral Norvir Prednisone Prednisolone Solumedrol	Fludrocortisone Methylprednisolone Ritonavir Prednisone
990	Meds-Aspirin. Within 5 days preceding surgery.	Anti-inflammatory, Analgesic and Antiplatelet action. Half-life of aspirin products is 5-7 days.	Baby Aspirin ASA Enteric Coated (Ecotrin)	Choline Mag. Trisalicylate
1000	Meds – Lipid Lowering. Within 24 hours preceding surgery.	Medications administered to lower total cholesterol, LDL, HDL or Triglyceride levels. Patient may be on prescribed medication and have normal cholesterol values, these patients should still be coded as Dyslipidemia (seq # 420).	Clofibrate Baycol * Colestid Lescol * Lipitor * Lopid Mevacor * Niaspan Extended-Release Pravachol * Tricor Zocor *	Atromid-S Cerivastatin * Fluvastatin Sodium * Atorvastatin Calcium * Gemfibrozil Lovastatin * Niacin Pravastatin * Fenofibrate Simvastatin *
1010	Meds – Lipid Lowering – Medication Name	Indicate which lipid lowering medications the patient was on; statin or non statin for the list above (seq# 1000). Medications with (*) indicate Statin drug.		
1020	Meds – ADP Inhibitors. Within 24 hours preceding surgery.	These medications inhibit platelet aggregation (clotting). Often used to treat patients with history of atherosclerotic cardiovascular disease and potentially reduce the incidence of major cardiovascular events (stroke, peripheral arterial disease events). Peak drug levels are reached within 3 – 7 days of initiated maintenance dosing, while termination of drug effects are not seen for 5 days after last dose.	Plavix Ticlid	Clopidogrel Ticlopidine
1030	Meds – Glycoprotein. IIB IIIA Inhibitors Within 24 Hours.	These medications are anti-platelet, thrombin agents.	Aggrastat Integrilin ReoPro	Triofiban Eptifibatid Abciximab
1040	Meds – Glycoprotein. IIB IIIA Inhibitor Name.	Indicate which of the IIB IIIA inhibitors listed above (seq# 1030) received.		