SAN FRANCISCO EMERGENCY MEDICAL SERVICES AGENCY

Effective: 01/07/13 **Protocol: P-014.3**
Supersedes: 09/01/11

DYSRHYTHMIAS: NARROW COMPLEX TACHYCARDIA

SUBJECTIVE FINDINGS

- See DYSRHYTHMIAS: OVERVIEW Protocol (P-014)

OBJECTIVE FINDINGS

- Mental status
- Heart rate
- Blood pressure
- Evidence of CHF

Definition of Stable Vs. Unstable	
STABLE: - Normal mental status AND/OR - Signs of normal or mildly decreased perfusion.	**UNSTABLE** - Signs of poor perfusion: - Heart rate - Decreased level of consciousness or altered mental status. - SBP < 90 (with signs/symptoms of hypo-perfusion). - CHF (Respiratory distress with rales). - Moderate to severe chest pain.

STABLE	
BLS Treatment	**ALS Treatment**
• Routine Medical Care. • High flow oxygen. • Shock position. • Regular reassessment of vital signs and signs of perfusion.	• IV access. • 12 lead ECG. • Consider vagal maneuvers (Valsalva, cough or breath holding). • **Adenosine** 6 mg rapid IVP flushed with 20 ml NS bolus. • If dysrhythmia persists 1-2 minutes after initial dose, repeat **Adenosine** 12 mg rapid IVP flushed with 20 ml NS bolus. Repeat q 1-2 minutes up to a total of 30 mg. • **Withhold Adenosine if rapid atrial fibrillation**.

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UNSTABLE	
BLS Treatment	**ALS Treatment**
• Routine Medical Care. • High flow oxygen. • Shock position. • Regular reassessment of vital signs and signs of perfusion.	• **Midazolam** 5 mg IN (2.5 mg each nostril) or 5 mg IM or 2.5 mg slow IV push to a maximum dose of 5 mg (may be repeated every five minutes). • **Morphine sulfate** 4 mg slow IVP for pain control if needed and normotensive. See PAIN CONTROL Protocol (P-019). • **Synchronized cardioversion** (50 J, 75 J, 120J, 150 J, 200J) for biphasic; OR equivalent monophasic; per manufacturer's instructions. See PRECAUTIONS AND COMMENTS. • Only administer **cardioversion** for atrial fibrillation if patient is unstable.
BASE HOSPITAL CONTACT	
The effects of Midazolam and Morphine may be potentiated if administered together. Contact Base Hospital if considering administering both medications	

DOCUMENTATION

- Document whether the patient was stable for unstable (chart contains word "stable" or "unstable").
- Stable patients receive either Valsalva maneuver or **Adenosine.**
- Cardio version time, number of joules and patient response.
- Cardioverted patients receive sedation if conscious and normotensive.

PRECAUTIONS AND COMMENTS

- **Narrow QRS complex is defined as < 0.12 seconds.**
- If the rate is **< 160 bpm**, consider sinus tachycardia. Sinus tachycardia is most likely secondary to some other factor such as hypoxia, hypovolemia, pain, fever, etc.
- An **irregular** rapid rhythm is most likely atrial fibrillation.
- Synchronized cardioversion energy levels vary according to the type of waveform, biphasic or monophasic. Follow manufacturer's instructions when cardioverting.
- **Adenosine** administration is associated with flushing, dyspnea and chest pain, which resolves within 1 to 2 minutes in most patients. These symptoms may be alarming and patients should be advised accordingly.
- **Adenosine** should only be used when a supraventricular origin is strongly suspected. Do not use to discriminate ventricular tachycardia from supraventricular tachycardia with aberrancy.
- Do not use **Adenosine** on a patient with a known history of Wolff-Parkinson-White (WPW) syndrome.