

## **Procedure Name: Upper Extremity Venous Doppler with Color Flow**

Updated 2/13/09

### **Indications:**

May include but not limited to arm pain of questionable etiology, tightness, tenderness and discoloration of upper extremity, question of pulmonary emboli, chronic arm ulcers or color changes of arms, varicose and follow up chronic DVT.

### **General Description:**

This is a complete survey to localize and characterize disease of the upper extremities unilateral or bilateral.

### **Patient Preparation:**

There is no preparation for this exam.

### **Equipment Selection and Settings:**

Select PV Vein from preset menu

A linear 6.0MHz probe will be used for most patients. The sonographer should use the preprogrammed setting for the appropriate body part and adjust gain, depth and transmit zone settings to optimize images. Fill out any applicable impression or worksheet upon completion of exam.

### **Imaging Sequence:**

- Image patient data (demographics page)

Vessels of the upper extremities that may be imaged:

- **Internal Jugular Vein**
- **Brachiocephalic Vein**
- **Subclavian Vein**
- **Cephalic Vein**
- **Axillary Vein**
- **Basilic Vein**
- **Brachial Vein**
- **(additional evaluation and imaging of vessels of the forearm required if pathology present)**
- **Radial Vein**
- **Ulnar Vein**

The following sequence will be imaged for each vessel listed above except where noted otherwise:

1. **trans, with and with out compression (imaged with color flow-doppler and dual screen)**
2. **long**
3. **long color flow (doppler)**
4. **spectral wave form for spontaneity**
5. **spectral wave form for phasicity**
6. **spectral wave form for augmentation**