

Subacromial Space Injection		
Category	Clinical Checklist Steps to Complete	Assessment Checklist Check errors performed or needed correction to avoid
<b>Confirm Indication</b>	<ol style="list-style-type: none"> <li>1. Subacromial bursitis</li> <li>2. Rotator cuff impingement</li> <li>3. Rotator cuff tendinosis</li> <li>4. Adhesive Capsulitis</li> </ol>	<input type="checkbox"/> Unable to identify a valid indication. <input type="checkbox"/> Proposed indication not supported by proper historical or exam features.
<b>Contra-indications</b>	<ol style="list-style-type: none"> <li>1. Hardware in the joint</li> <li>2. Infection in joint or overlying skin</li> <li>3. Periarticular fracture, injury, or instability</li> <li>4. Potential for shoulder surgery in 3mo.</li> </ol>	<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> Unable to confirm absence of contraindications (*multiple points possible)
<b>Obtain Consent</b>	<b>Explain &amp; and confirm patient's understanding:</b> <ol style="list-style-type: none"> <li>1. Procedural process</li> <li>2. Risks &amp; techniques to mitigate them</li> <li>3. Potential benefits</li> <li>4. Risks of not performing and alternatives.</li> </ol>	<input type="checkbox"/> Did not obtain consent <input type="checkbox"/> Uses complicated terminology <input type="checkbox"/> Fails to provide all 4 steps of the consent process
<b>Supplies</b>	See below for full list	<input type="checkbox"/> Fails to obtain all necessary supplies before starting
<b>Positioning</b>	<ol style="list-style-type: none"> <li>1. Sitting upright with shoulder exposed</li> <li>2. Hands interlaced on lap with relaxed shoulder</li> </ol>	<input type="checkbox"/> Fails to position patient with exposed and relaxed shoulder in the same position for landmark identification and the procedures
<b>Identify Entry Site</b>	Identify the inferior aspect of where the scapular spine meets the lateral acromion. Mark the needle insertion point, 1-2cm inferior to that posterior-lateral angle of the acromion.	<input type="checkbox"/> Mis-identified inferior margin of scapular spine = 1 <input type="checkbox"/> Mis-identified lateral edge of acromion =1 <input type="checkbox"/> Mis-identified an appropriate insertion point 1-2cm inferior to posterior-lateral angle
	Verification of entry site by preceptor	<input type="checkbox"/> Does not ask for verification
<b>Draw-up solutions</b>	<ol style="list-style-type: none"> <li>1. Clean each vial with 1 alcohol swab</li> <li>2. Using the larger needle aspirate 1-4 cc of lidocaine, then 1cc of triamcinolone or methylprednisolone</li> </ol>	<input type="checkbox"/> Fails to clean top of vial <input type="checkbox"/> Uses incorrect needle <input type="checkbox"/> Fails to aspirate most of steroid <input type="checkbox"/> Fails to recap and remove needle safely
<b>Timeout</b>	Confirm name, DOB, Procedure, Location, Allergies	<input type="checkbox"/> Fails to perform
<b>Sterile Prep</b>	Scrub chlorhexidine over insertion site >30 seconds, or apply providone-iodine around insertion site and allow to dry	<input type="checkbox"/> Does not sufficiently sterilize the site <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> Contaminate site (*multiple points possible)
	Maintain sterile site with no touch technique	
<b>Needle Insertion</b>	Insert quickly through the skin under acromion toward AC joint (slightly superior and medial) to a depth of 2-4cm.	<input type="checkbox"/> Concern for instability of grip <input type="checkbox"/> Advances needle in incorrect direction <input type="checkbox"/> insertion depth less than 2cm or more than 4 cm
	Aspiration prior to injection of medication	<input type="checkbox"/> Fails to attempt aspiration prior to injection
	If difficulty advancing, then partially withdraw the needle close to the skin surface and redirect.	<input type="checkbox"/> Pivots fully inserted needle rather than withdrawing and redirecting
<b>Extraction</b>	Obtain hemostasis and apply band aid	

Supplies	
Marker	18-22g needle (for drawing up)
Lidocaine 1% (4cc)	21-25g 1.5" needle (for injection)
Triamcinolone or Methylprednisolone 40mg/mL (1cc)	5-10cc syringe
Alcohol swab	2x2 gauze
Chlorhexidine or providone-iodine swab	Band-aid
	Ethyl chloride spray (optional)