Rationale

Neuroradiologists use nerve root blocks to try and localise back and lower limb pain to a particular nerve root. The degree of pain relief attained following the procedure can be used to decide whether spinal surgery should be offered and at which spinal level.

The majority of nerve root blocks are performed on outpatients whose notes are not retrieved. Good documentation with completed consent, WHO checklist and a radiology report documenting the level treated and the drugs used keeps the referring clinician informed of events and is important for medico-legal reasons.

Patients are asked to complete a pain diary for 4 weeks following the procedure and return this to the radiology department. The referrer can then make an informed decision on whether spinal surgery would benefit the patient.

Method

Nerve root injections were filtered on the CRIS. The documentation and reports for the procedures were analysed. Documentation was audited over two five month periods:
- First round: November 2015 - March 2016 = 62 events
- Second round: September 2016 – January 2017 = 52 events

Changes were implemented following the first round to try and improve documentation before repeating the audit.

Results

<table>
<thead>
<tr>
<th>Documentation Item</th>
<th>Round 1</th>
<th>Round 2</th>
<th>Standard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Consent form</td>
<td>73%</td>
<td>98%</td>
<td></td>
</tr>
<tr>
<td>WHO checklist</td>
<td>90%</td>
<td>100%</td>
<td></td>
</tr>
<tr>
<td>Radiology report</td>
<td>94%</td>
<td>98%</td>
<td></td>
</tr>
<tr>
<td>Pain diary</td>
<td>60%</td>
<td>69%</td>
<td></td>
</tr>
</tbody>
</table>

Changes

To improve documentation after the first round, the following changes were implemented:

1. The WHO checklist is signed and put in an allocated place following pre-procedure checks. Only the operator moves the WHO form at the end of procedure when ready to perform post-procedure checks.
2. Radiographers check that the WHO and consent forms are complete at the end of a procedure with CRIS prompts as a reminder.
3. New radiographers and radiology trainees are reminded that formal reports are required.
4. The radiologist performing the procedure checks that all documents were completed when writing the report.

Discussion

Documentation has greatly improved on reaudit with only one clinical report and one consent form omitted during the second round. All WHO checklists were completed on reaudit. All radiology staff involved with nerve root injections were involved in implementing the above changes to improve documentation.

The return of patient pain diaries remains below the standard set and clinicians should ensure that they continue to encourage patients to return their diaries completed. Patients are given a stamped addressed envelope and the purpose of the diary is explained to them at the time of the procedure.

References