Preamble

The insertion of an intraocular lens (IOL) involves a complex range of steps within the care pathway. In this context, the care pathway starts when the patient agrees to have a cataract operation when it has been advised by the ophthalmologist. It should ideally be concluded when the correct IOL is inserted at the time of surgery. The results, namely the patient’s visual acuity and refractive error, are evident as the eye recovers from surgery in the following days. An incorrect lens may be inserted as a result of a variety of causes, and this may become evident at the time of surgery or shortly after when steps may be taken to remove the incorrect lens and replace it with the correct one (ie as part of the one admission), or it may become evident when the visual result proves unsatisfactory in the period of recovery. Changing the lens will then involve another admission for further surgery to replace the IOL.

The surgeon is ultimately responsible for the correct lens being inserted, and various tasks associated with lens selection are delegated to trained staff along the pathway. The surgeon who implants the lens must review the results of the delegated tasks in choosing the correct lens.

This process has been developed in response to a number of incidents where the incorrect lens was inserted and a subsequent operation required to replace it with the correct lens. The process has been developed in consultation with the Statewide Ophthalmology Service and specialist ophthalmology theatre nursing staff.

The recommended process does not replace the Correct Patient, Correct Procedure, Correct Site Policy. Instead, it provides extra guidance as to how the particular process of IOL insertion may be best undertaken in complying with this policy.
**Key Steps**

1. Agree with patient to have cataract replacement  
   Outcome = Informed consent

2. Take measurements and review quality and accuracy of measurements  
   Outcome = Accurate description of eye

3. Review measurements with patient history and examination  
   Outcome = Desired type of IOL

4. Calculate power required  
   Outcome = Desired power of IOL

5. Review ocular measurements and lens power calculations to ensure supply of the correct IOL for surgery. This should involve the operating surgeon and be done in time to allow for delivery of a lens that may need to be specially ordered. This step is not required for cases where the final lens power calculation and selection are to be performed in the operating room.  
   Outcome = Any special order requirements communicated to theatre staff

6. Screening process  
   Outcome = Confirmed IOL supply and biometry  
   Key points  
   • Theatre staff need to have a process to ensure IOL supply and availability of measurements. Such steps may include:  
     i. Check that lens size and type (or details of when the size and type are to be derived) are recorded  
     ii. Check quality of biometry and reorder if required  
     iii. If lens required needs a special order then place order  
     iv. If not a large consignment on hand, check the availability of the required lens and order as required.
7. Confirm patient’s identity
Outcome = Confirmed patient
Key points
• When patient arrives at theatre for their surgery their identity needs to be confirmed
• Ask the patient (or their representative)
  i. What is your name?
  ii. What is your date of birth?
  iii. What are you here for?
• Verify the answers to these questions against the patient notes and their identification band
  (to ensure looking at correct notes for this patient)

8. Theatre to confirm availability of the lens
Outcome = Confirmed lens available for use
Key points
• Confirm lens for patient just prior to surgery, using notes that have arrived with the patient
  (to ensure only considering requirements for one patient at a time)
• Check notes and biometry
• Re-scan if required
• Ideally this would happen prior to anaesthetic but this is not practical in many cases and, as
  long as the previous steps have been performed, there should be no problems with doing this
  step after the administration of the anaesthetic.

9. Pick lens from stock
Outcome = Only one lens in theatre and it is the correct one
Key points
• Avoid delay between confirming lens and selecting it from stock
• Do not select lens until patient arrives (i.e. do not lay all lenses out in order as order may
  change)
• Arrange stock so as to facilitate easy identification of lens
• Only have one lens in the theatre at any one time
10. Time Out
Outcome = Confirmation of patient, procedure and prosthesis
Key points
• Enforce time out procedure
• Should include whole team
• Follow checklist and check lens type and power

11. Change of desired lens during procedure
Outcome = Only one lens in theatre and it is the correct one
Key points
• This step may happen during some cases
• Important to take the lens no longer required out of the theatre before selecting the new one from stock and bringing it into the theatre to avoid the potential confusion of having multiple lenses in theatre

12. Open lens
Outcome = Confirmation that correct lens is open and ready for insertion
Key points
• Final check with surgeon prior to opening lens package
Recommended intraocular lens insertion process

Before Day of Surgery Flow

Start

STEP 1
Agree with patient to have cataract replacement

Informed consent

STEP 2
Take measurements and review quality / accuracy of measurements

STEP 3
R/v measurements with patient history and examination

Accurate description of eye

STEP 4
Calculate power required

Desired type of IOL

Desired power of IOL

STEP 5
Check desired type & power of IOL will be available in time for surgery

Determine special IOL Order

STEP 6
Screening process

IOL and measurements supply recorded?

Scan good quality?

No

Order new scan

Yes

Large consignment on hand?

Yes

No

Special order required?

In stock?

Yes

Order lens

No

Day of Surgery

Return record to specialist

To be read in conjunction with SN 008/09
Insertion of Intraocular lens, March 2009
Recommended intraocular lens insertion process

Day of Surgery Flow

1. Patient arrives with their notes
   - STEP 7: Confirmation of patient identity
   - STEP 8: Confirmation of lens with biometry and history
   - STEP 9: Select lens from stock
   - Bring lens into theatre
   - STEP 10: Time out - confirm lens
   - Decide different lens required
     - Yes: STEP 11: Take lens out of theatre
     - No: Bring lens into theatre
   - STEP 12: Time for lens - confirm lens before opening

To be read in conjunction with SN 008/09
Insertion of Intraocular lens, March 2009