

## Network radiotherapy treatment protocol for Prostate and Seminal Vesicles

### SECTION 1: Treatment options

#### Hormones

Patients receiving **C61-36.25(I)5 SABR** or **C61-62(I)20** should not receive hormones. Otherwise, ADT duration is determined by the disease risk:

- Intermediate risk prostate cancer – 6 months
- High risk or locally advanced node negative prostate cancer - 2 years
- Node positive prostate cancer – 2 years minimum
- Metastatic prostate cancer – lifelong hormones

#### Radiotherapy

There must be a 3-month delay between surgery and radiotherapy for all patients who have undergone a TURP.

#### Indications and intent

#### Regime, technique and RCR

##### **C61-36.25(I)5 SABR, Radical**

Low and favourable-intermediate risk (NCCN)  
Low volume grade group 3 cancer acceptable  
As per *PACE B*

- 36.25 Gy in 5 fractions **DAILY/ALTERNATE** days over 1-2 weeks
- SABR
- V36.25 Gy to PTV at least 95%
- V40 Gy to CTV at least 95%
- *RCR2* deliver whole course within 21 days

##### **C61-62(I)20, Radical**

Low and favourable-intermediate risk (NCCN)  
not suitable for SABR  
Low volume grade group 3 cancer acceptable  
As per *Standard Arm PACE B*

- 62 Gy in 20 fractions **DAILY** over 4 weeks
- VMAT
- Median dose (D50%) of PTVp\_62
- *RCR2* five missed fractions

##### **C61-60(I)20 Radical**

Any T, node negative disease  
No PSA limit  
As per *Pivotal boost Arm A – NCCC* only  
As per *Pivotal and CHHiP – JCUH* only

- 60 Gy in 20 fractions **DAILY** over 4 weeks
- VMAT
- Median dose (D50%) of PTVp\_60
- *RCR2* five missed fractions

##### **C61-60(I)20+N, Radical**

High risk node negative and node positive disease, no PSA limit  
As per *Pivotal Boost Arm B- or NRG guidance*

- 60 Gy in 20 fractions **DAILY** over 4 weeks
  - +Elective Nodes: 44-47 Gy
  - +Involved nodes: 50-60 Gy (location dependent)
- VMAT
- Median dose (D50%) of PTVp\_60
- *RCR2* five missed fractions

##### **C61-62(I)20+N Radical**

High risk node negative and node positive disease. No PSA limit.  
Dose escalation option for unfavourable local disease in presence of mild LUTS.

- 62 Gy in 20 fractions **DAILY** over 4 weeks
  - +Elective Nodes: 44-47 Gy
  - +Involved nodes: 50-60 Gy (location dependent)
- VMAT
- Median dose (D50%) of PTVp\_62
- *RCR2* five missed fractions

##### **C61-62(I)20+H Radical**

High risk node negative disease. No PSA limit.  
Dose escalation option for unfavourable local disease in presence of mild LUTS.

- 62 Gy in 20 fractions **DAILY** over 4 weeks
- VMAT
- Median dose (D50%) of PTVp\_62
- *RCR2* five missed fractions

<p><b>C61-60(I)20+IsoMet, Radical</b> As per <i>Pivotal boost Arm A</i> but including an isolated metastasis e.g. pubic bone</p>	<ul style="list-style-type: none"> <li>• 60 Gy in 20 fractions <b>DAILY</b> over 4 weeks <ul style="list-style-type: none"> <li>◦ +IsoMet: 60 Gy</li> </ul> </li> <li>• VMAT</li> <li>• Median dose (D50%) of PTVp_60</li> <li>• <i>RCR2</i> five missed fractions</li> </ul>
<p><b>C61-60(I)20+IsoMet+N, Radical</b> As per <i>Pivotal boost Arm A</i> but including isolated metastasis e.g. pubic bone and nodes</p>	<ul style="list-style-type: none"> <li>• 60 Gy in 20 fractions <b>DAILY</b> over 4 weeks <ul style="list-style-type: none"> <li>◦ +IsoMet: 60 Gy</li> <li>◦ +Elective Nodes: 44-47 Gy</li> <li>◦ +Involved nodes: 50-60 Gy (location dependent)</li> </ul> </li> <li>• VMAT</li> <li>• Median dose (D50%) of PTVp_60</li> <li>• <i>RCR2</i> five missed fractions</li> </ul>
<p><b>C61-46(I)23+N Radical</b> Phase 2 boost to whole pelvis after HDR brachytherapy at Leeds Teaching Hospital</p>	<ul style="list-style-type: none"> <li>• 46 Gy in 23 fractions <b>DAILY</b> over 4.5 weeks</li> <li>• VMAT</li> <li>• Median dose (D50%) of PTV</li> <li>• <i>RCR2</i> five missed fractions</li> <li>• Commence within 3 weeks</li> </ul>
<p><b>C61-37.5(I)15 Radical</b> Phase 2 boost to local disease after HDR brachytherapy at Leeds Teaching Hospital</p>	<ul style="list-style-type: none"> <li>• 37.5 Gy in 15 fractions <b>DAILY</b> over 3 weeks</li> <li>• VMAT</li> <li>• Median dose (D50%) of PTV</li> <li>• <i>RCR2</i> five missed fractions</li> <li>• Commence within 3 weeks</li> </ul>
<p><b>C61-36(I)6, Palliative</b> Palliative/local control of locally advanced or low volume metastatic disease</p>	<ul style="list-style-type: none"> <li>• 36 Gy in 6 fractions <b>WEEKLY</b> over 6 weeks</li> <li>• VMAT</li> <li>• Median dose (D50%) of PTV_36</li> <li>• <i>RCR3</i> two missed fractions</li> </ul>