

NATIONAL RADIATION PROTECTION OFFICE UPDATE 8TH JUNE 2020



RADIATION SAFETY INCIDENTS REPORTED ON THE NATIONAL INCIDENT MANAGEMENT SYSTEM (NIMS) Q1 2020

This report details all radiation safety incidents reported by public hospitals on the NIMS from January to March 2020. The figures listed below do not include incidents related to ultrasound, MRI or issues with peripheral vascular catheters.

1. Category of radiation safety incident

Category of incident	Radiology	Radiotherapy
Actual incidents	169	4
Near miss events	54	165
Total number of reports	223	169

2. Category of person affected by the radiation safety incident

Category of person	Radiology	Radiotherapy
Adult / service user	195	169
Paediatrics	0	0
Neonates	3	0
Staff member inadvertently exposed to radiation	25	0

3. Details of the process involved in the incidents.

Radiology incidents reported on the NIMS in Q1 2020						
Process	Severity Rating					Total
	Extreme	Major	Moderate	Minor	Negligible	
Checking patient identification					13	13
Clinical details on referral					61	61
Documentation / records					30	30
Communication / consent issues					7	7
Equipment failure					25	25
Performing procedure			2	4	45	51
Pregnancy status					3	3
Not Applicable / unknown					33	33

Comments:

The 33 reports categorised as *Not applicable / unknown* refer to:

- Overexposure notifications
- Non-adherence to laser safety guidelines by failing to wear appropriate protection

- Inadvertent staff irradiation
- Repeat procedures that were required when an inappropriate protocol was followed or because the initial procedure had failed to achieve the required image.

Radiotherapy incidents reported on the NIMS in Q1 2020						
Process	Severity Rating					Total
	Extreme	Major	Moderate	Minor	Negligible	
Documentation / records					32	32
Communication / consent issues					16	16
Performing procedure					121	121

4. Causes of the radiation safety incidents reported in Q1 2020

Radiology incidents reported on the NIMS in Q1 2020						
Cause	Severity Rating					Total
	Extreme	Major	Moderate	Minor	Negligible	
Diagnostic exposure greater than intended					24	24
General exposure related issue					24	24
Failure / malfunction of process			2	1	36	39
Inadvertent dose to foetus (<1mSv)					2	2
Wrong body part / side /site					52	52
Wrong radiopharmaceutical					1	1
Wrong patient (>1mSv)					11	11
Wrong patient (<1mSv)					11	11
Wrong treatment / process / procedure					17	17
Not applicable / unknown				3	39	42

Comment:

The 42 reports categorised as *Not applicable / unknown* refer to

- Patient related issues
- Incidents that involved more than one NIMS category
- Issues that arose in relation to procedures.

Radiotherapy incidents reported on the NIMS in Q1 2020						
Cause	Severity Rating					Total
	Extreme	Major	Moderate	Minor	Negligible	
Dose or volume variation in one fraction >10% wrt fraction dose					1	1
Failure / malfunction of process					13	13
Wrong treatment / process /procedure					149	149
Wrong body part / side / site					1	1
*Other					5	5

Comment:

The 5 reports categorised as *Other* relate to

- 2 incidents where incorrect personal information was recorded in a patient's record
- 2 reports involving a failure in communication within the multidisciplinary team
- 1 incident where a patient failed to attend for an appointment.