







Hospital Infection Society (HIS) Prevalence Survey of healthcare-associated Infections in UK and Irish Acute Hospitals: Irish Hospital Prevalence rates

The third Hospital Infection Society / Infection Control Nurses Association prevalence survey of healthcare-associated infections (HCAI) in acute hospitals was carried out in the UK and Ireland between February and May 2006. The survey in Ireland was coordinated by the Health Protection Surveillance Centre in conjunction with the Irish members of the HIS steering group. The 44 acute adult hospitals in Ireland that voluntarily participated representing the vast majority of eligible acute adult hospitals in Ireland. Because of difficulties in applying definitions to children, children's hospitals and certain other clinical areas were excluded.

The overall rate of HCAI in Ireland was 4.9%. This varied depending on the type of hospital surveyed: from 6% in regional/tertiary hospitals, to 4% in general hospitals and 2% in specialist hospitals.

The following tables show individual hospital results from the Irish participants.

• Hospitals have been classified as they were for the SARI hospital survey 2004 into regional/tertiary, general and specialist hospitals. Within this classification hospitals vary considerably with respect to the types of patients surveyed and their risk factors for HCAI. Results are presented in three main columns for each group: hospital details, risk factors for HCAI and HCAI details.

- Results must be interpreted in the light of the fact that the auditing process
 took place over several months and not one day. Differences in hospital
 occupancy and case mix that would normally be expected during this period
- In addition, the variations in HCAI rates between the hospitals are due to many reasons including differences in their patients and isolation facilities.

 Hospitals that treat patients with risk factors for HCAI (such as patients that have had recent surgery, those on ventilators, those with medical devices such as intravenous lines (drips) or urinary catheters) are more likely to have higher HCAI rates. It is worth noting that not all HCAI risk factors were taken into account during this survey (presence of impaired immune system e.g.: cancer chemotherapy).

This survey has provided important detailed information on the prevalence of HCAI in Irish acute hospitals. Although Irish hospitals have participated in previous surveys of HCAI, and many hospitals carry out regular surveillance of HCAI, this was the first opportunity to collect detailed information and compare it directly with that from other Irish hospitals, as well as with data from the UK. It is only by monitoring, measuring and documenting rates of infections that we can make plans to reduce it. This study is a useful beginning from which we can learn and improve in our methods of monitoring and also hopefully in methods of reducing HCAI.

This survey represents a baseline for future surveys of HCAI, which are essential as part of a national surveillance scheme.

			Number of patients with HCAI risk factors								%	Number of
	Number							Recent		Number	with	patients with
	of			Peripheral	Central		Receiving	non-	Recent	patients	HCAI	MRSA-
	patients	Mean	Urinary	IV	IV	Mechanical	Parenteral	Implant	Implant	with	(HCAI	related
General hospitals	surveyed	Age	Catheter	Catheter	Catheter	ventilation	nutrition	surgery	surgery	HCAI	rate)	HCAI
Blackrock Clinic	46	67.43	8	20	2	0	0	17	14	3	6.5%	0
Bon Secours Hospital, Tralee	71	65.03	7	28	0	0	0	4	9	2	2.8%	0
Bon Secours Hospital, Dublin	95	62.15	7	30	1	0	1	24	13	3	3.2%	0
Bon Secours Hospital, Cork	205	60.81	23	82	4	1	2	41	25	8	3.9%	1
Cavan General Hospital	137	63.11	17	60	4	3	4	21	1	5	3.6%	0
Our Lady of Lourdes Hospital, Drogheda	208	59.13	32	78	5	2	1	26	19	12	5.8%	2
The Galway Clinic, Galway	80	62.73	4	28	8	1	0	13	14	0	0.0%	0
Letterkenny General Hospital	211	59.74	29	101	8	2	2	17	16	9	4.3%	1
Louth County Hospital, Dundalk	69	65.30	10	41	0	1	0	3	3	1	1.4%	1
Mater Private Hospital, Dublin	141	64.91	20	63	10	1	1	55	21	4	2.8%	0
Mayo General Hospital	200	64.35	35	103	5	1	0	12	22	7	3.5%	1
Mercy University Hospital, Cork	165	65.36	34	83	10	4	11	26	9	17	10.3%	3
Monaghan General Hospital	66	72.41	9	32	0	0	0	0	0	4	6.1%	0
Mount Carmel Hospital, Dublin	89	52.34	3	23	1	0	0	21	14	2	2.2%	0
Midland Regional Hospital, Mullingar	138	58.80	12	60	3	3	1	13	0	4	2.9%	0
Naas General Hospital	167	68.32	31	65	5	1	0	6	0	4	2.4%	0
Our Lady's Hospital Navan	117	70.26	15	51	5	3	1	5	22	4	3.4%	0
Portiuncula Hospital, Ballinasloe	130	59.28	19	52	2	0	1	19	3	5	3.8%	1
Midland Regional Hospital, Portlaoise	101	57.65	10	47	2	0	1	13	2	2	2.0%	0
Midwestern Regional Hospital, Nenagh	67	69.52	10	35	0	0	1	3	1	3	4.5%	0
Midwestern Regional, Ennis	89	71.75	10	40	2	0	2	5	2	5	5.6%	0
South Infirmary Victoria University												
Hospital, Cork	135	65.69	18	64	3	2	8	23	6	18	13.3%	6
St John's Hospital, Limerick	76	67.50	12	32	0	0	0	10	2	0	0.0%	0
St. Lukes General Hospital, Kilkenny	163	59.60	29	62	11	2	1	19	1	3	1.8%	0
St. Michaels Hospital, Dun Laoghaire	81	71.59	10	32	1	0	0	6	5	1	1.2%	0
St Vincent's Private Hospital, Dublin	138	63.05	17	39	15	0	5	44	9	7	5.1%	1
Midland Regional Hospital, Tullamore	166	64.52	16	65	4	1	4	12	30	2	1.2%	0
Wexford General Hospital	166	68.23	35	72	6	4	1	23	7	11	6.6%	0

				Numbe			Number					
Regional / Tertiary Hospitals	Number of patients surveyed	Mean Age	Urinary Catheter	Peripheral IV Catheter	Central IV Catheter	Mechanical ventilation	Receiving Parenteral nutrition	Recent non- Implant surgery	Recent Implant surgery	Number of patients with HCAI	% with HCAI (HCAI rate)	of patients with MRSA- related HCAI
Beaumont Hospital, Dublin	529	64.35	127	225	48	15	7	104	59	38	7.2%	3
Connolly Hospital	189	66.86	34	98	5	0	1	17	14	9	4.8%	0
Mater Misericordiae University Hospital, Dublin	422	66.23	91	163	44	7	6	74	55	30	7.1%	0
Midwestern Regional Hospital Dooradoyle, Limerick	297	63.64	48	141	11	2	4	34	28	15	5.1%	7
Sligo General Hospital	248	67.57	27	93	9	1	1	44	22	5	2.0%	1
St James Hospital, Dublin	493	66.53	60	141	59	12	12	59	52	33	6.7%	5
St Vincents University Hospital, Dublin	334	64.41	78	137	41	4	4	66	30	27	8.1%	1
The Adelaide and Meath Hospitals, Dublin, incorporating the National Children's Hospital.	365	61.96	64	175	36	5	6	43	49	30	8.2%	1
University College Hospital and Merlin Park Regional Hospital, Galway.	527	60.40	65	201	35	6	8	79	71	21	4.0%	2
Waterford Regional Hospital	267	62.67	40	90	21	4	6	37	39	8	3.0%	0

			Number of patients with HCAI risk factors									Number
Specialist Hospitals	Number of patients surveyed	Mean Age	Urinary Catheter	Peripheral IV Catheter	Central IV Catheter	Mechanical ventilation	Receiving Parenteral nutrition	Recent non- Implant surgery	Recent Implant surgery	Number of patients with HCAI	% with HCAI (HCAI rate)	of patients with MRSA- related HCAI
Cappagh National Orthopaedic Hospital, Dublin	53	64.94	5	13	2	0	0	3	44	1	1.9%	0
National Maternity Hospital, Holles Street, Dublin.	88	43.33	9	9	1	0	0	21	0	0	0.0%	0
Regional Maternity Hospital, Limerick	52	29.04	1	11	0	0	0	13	0	0	0.0%	0
Midwestern Regional Orthopaedic Hospital, Croom	29	64.34	0	5	0	0	0	1	18	0	0.0%	0
Royal Victoria Eye & Ear Hospital, Dublin	40	58.60	0	19	0	0	0	17	11	0	0.0%	0
St Lukes Hospital, Dublin	91	63.73	3	15	7	0	0	2	4	6	6.6%	0