# COLORECTAL CANCER



Number of cases per year (2010-2014)			Number of deaths per year (2010-2014)			
Male	Female	Both sexes	Male	Female	<b>Both sexes</b>	
682	537	1219	226	194	419	
FIVE-YEAR SURVIVAL (2005-2009)						
Fr		VAL	22	<b>2-</b> YEAR PREVALI (2014)	ENCE	
Fr Male		Both sexes	Male 22		ENCE Both sexes	

## **INCIDENCE**

In 2010-2014 there were 682 male and 537 female patients diagnosed with colorectal cancer each year. The lifetime risk of developing a colorectal cancer was 1 in 19 for men and 1 in 31 for women.

#### **Incidence trends**

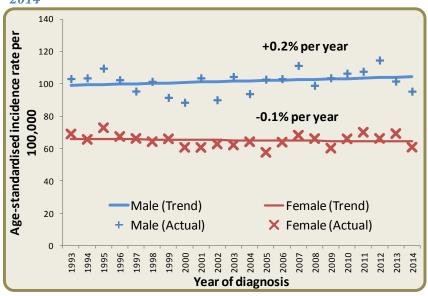
Table 1: Incidence of colorectal cancer by sex and year of diagnosis: 2005-2014

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Male	571	570	641	589	605	654	682	742	676	655
Female	415	470	512	503	464	514	553	536	574	510
Both sexes	986	1040	1153	1092	1069	1168	1235	1278	1250	1165

Over a ten year period the number of colorectal cancer cases increased from 571 among men and 415 among women in 2005 to 655 among men and 510 among women in 2014.

After accounting for the increasing number of older people in the NI population, colorectal cancer incidence rates among males and females during 1993-2014 have remained constant.

Figure 1: Trends in colorectal cancer incidence rates by sex: 1993-2014



# **Incidence** and age

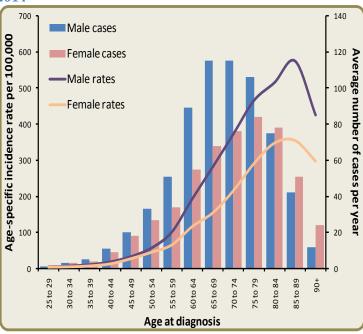
Colorectal cancer risk is strongly related to age with almost 70% of patients diagnosed over the age of 65 years. Incidence rates are highest among men and women aged 85-89.

Table 2: Average annual number of colorectal cancers diagnosed by sex and age: 2010-2014

Age	Male	Female	Total
0 to 49	42	38	83
50 to 64	173	116	289
65 to 74	230	144	374
75 and over	235	237	474
All ages	682	537	1219

Due to rounding of yearly averages, 'All ages' may not equal the sum of age categories in tables.

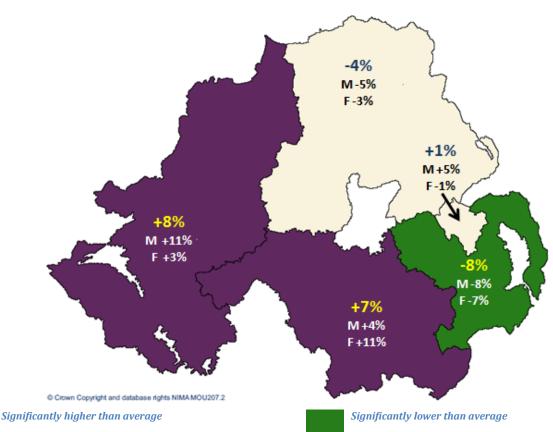
Figure 2: Incidence of colorectal cancer by age and sex: 2010-2014



# **Incidence by Trust area**

Colorectal cancer incidence rates in 2010-2014 were and higher than the NI average among people living within the Southern and Western HSCT areas, respectively. Incidence rates were lower than the NI average in the South-Eastern Trust area, particularly for men.

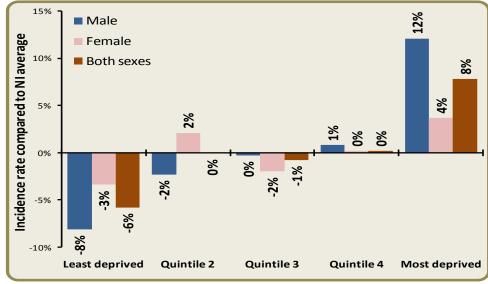
Figure 3: Colorectal cancer incidence rates compared to the NI average by sex and HSC Trust of residence: 2010-2014



# **Incidence by** deprivation

Colorectal cancer incidence rates are associated with socioeconomic deprivation incidence with rates increasing with levels of deprivation. This pattern is particularly marked for male colorectal cancer with incidence 12% higher in the most deprived communities than the NI average and 8% lower in

Figure 4: Colorectal cancer incidence rates compared to the NI average by sex and deprivation quintile: 2010-2014



the least deprived areas compared to NI as a whole.

# **Incidence by stage**

Cancer stage is a way of describing the size of a cancer and how far it has grown and spread. This information is important in helping decide what treatments are needed and stage of disease at diagnosis is strongly associated with cancer survival.

In 2010-2014 over four fifths (86.5%) of colorectal cancer patients in Northern Ireland

50% Male 45% Female 40% Both sexes Percentage of patients 35% 26.2% 25.5% 25.5% 24.5% 30% 19.1% 19.5% 25% 15.8% 15.1% 20% 11.6% 15% 10% 5% 0% Stage I Stage II Stage III Stage IV Unknown

Figure 5: Colorectal cancer stage distribution: 2010-2014

were assigned a stage at diagnosis.

A significant proportion of colorectal cancer patients were diagnosed at a later stages with 25.5% at stage III and 19.5% at stage IV, compared to 16.4% at stage I. There were no significant differences in stage distribution between males and females.

# **SURVIVAL**

The net survival was 77.3% at one year, and 56.3% at five years for colorectal cancer patients diagnosed in 2005 to 2009.

Table 3: Five-year colorectal cancer survival by survival time and sex: patients diagnosed 2005-2009

Time since		Diagnosed 2005-2009	
diagnosis	Male	Female	Both sexes
6 months	84.8%	82.7%	83.9%
1 year	78.6%	75.7%	77.3%
5 years	55.3%	57.5%	56.3%

#### **Survival Trends**

Five-year survival for colorectal cancer has improved from the 1993-1999 diagnosis period to the 2005-2009 diagnosis period; increasing from 49.6% to 56.3%.

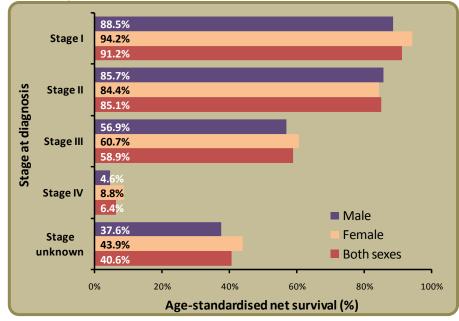
Table 4: Five-year colorectal cancer survival by period of diagnosis and sex

Period of diagnosis	Male	Female	Both sexes
1993-1999	49.2%	50.3%	49.6%
2000-2004	50.1%	55.4%	52.6%
2005-2009	55.3%	57.5%	56.3%

# Survival and stage

Stage at diagnosis is one of the most important factors in colorectal cancer survival with five year survival decreasing as stage increases. Five-year survival ranged from 91.2% for early (stage I) disease to 6.4% for late (stage IV) disease highlighting the importance of early diagnosis.

Figure 6: Five year survival from colorectal cancer by stage of diagnosis: patients diagnosed 2005-2009



# **MORTALITY**

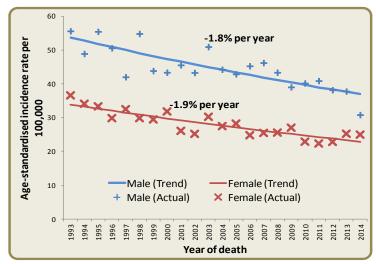
Mortality statistics are provided by the Northern Ireland General Registrar's Office. In 2010-2014 there were 226 male and 194 female deaths from colorectal cancer each year.

# Mortality trends

Over the last ten years the number of colorectal cancer deaths has decreased among men from 223 in 2005 to 201 in 2014 and have not changed among women from 207 in 2005 to 212 in 2014.

When adjusted for age and population change, colorectal cancer mortality rates decreased for males by -1.8% per year during 1993-2013, and decreased by -1.9% per year for females.

Figure 7: Trends in colorectal cancer mortality rates by sex: 1993-2014



## **Prevalence**

At the end of 2014 there were 7,934 people living in NI who had been diagnosed with colorectal cancer from 1993-2014 (Table 5). Of these, 53.9% were male, 63.4% were aged 70 and over and 11.7% had been diagnosed in the previous year.

Table 5: Number of people living with colorectal cancer at the end of 2014 who were diagnosed from 1993-2014 by time since diagnosis

			Time since	22-year		
Sex	Age	0-1 year	1-5 years	5-10 years	10-21 years	Prevalence
Male	0-69	259	732	389	243	1623
	70+	283	867	691	815	2656
	All ages	542	1599	1080	1058	4279
Female	0-69	179	535	314	254	1282
	70+	211	706	579	877	2373
	All ages	390	1241	893	1131	3655
Both sexes	0-69	438	1267	703	497	2905
	70+	494	1573	1270	1692	5029
	All ages	932	2840	1973	2189	7934

# **FURTHER INFORMATION**

Further data is available from the Northern Ireland Cancer Registry web site: www.qub.ac.uk/nicr

**NI Cancer Registry** 

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