



Feidhmeannacht na Seirbhíse Sláinte
Health Service Executive



RENAL

Epidemiology of ESKD in Ireland

Data from 2013/2014 NRO Census
and the
17th Annual Report of the UKRR 2014

The Future for Irish ESKD Epidemiology

HSE National Renal Office



Methodology

- NRO Annual Census 31st December 2013/14
- UKRR Annual Report 2014

- KDCPMS records used for 1st time 2014
- Standardised data collection instrument for others
- Not patient-linked unless in KDCPMS
- Improved external validation (with KDCPMS)
- Death/modality transfer not analysed

- Await my concluding exhortation/threat.....

Caveat re Prevalent Transplant Numbers

- We exercise caution every year regarding how exact this figure can be
- These patients are more mobile; may attend at more than one site for follow-up
- We continuously revise the figures from previous years, based on updated data
- We believe that we are more exact with each successive year

- KDCPMS is improving precision in this regard

Renal Replacement Therapies (RRT)

- Transplant (TX)
- Haemodialysis (HD)
 - Centre HD (cHD)
 - Satellite HD (sHD)
 - Contracted Satellite HD (sHDc)
 - Northern Ireland HD (NI)
- Home Dialysis (PD/HHD)

CSO population estimates

• April 2005	4,133,800
Census 2006	4,232,900
• April 2007	4,375,800
• April 2008	4,485,100
• April 2009	4,533,400
• April 2010	4,554,900
Census 2011	4,574,900
• April 2012	4,585,400
• April 2013	4,593,100
• April 2014	4,609,600

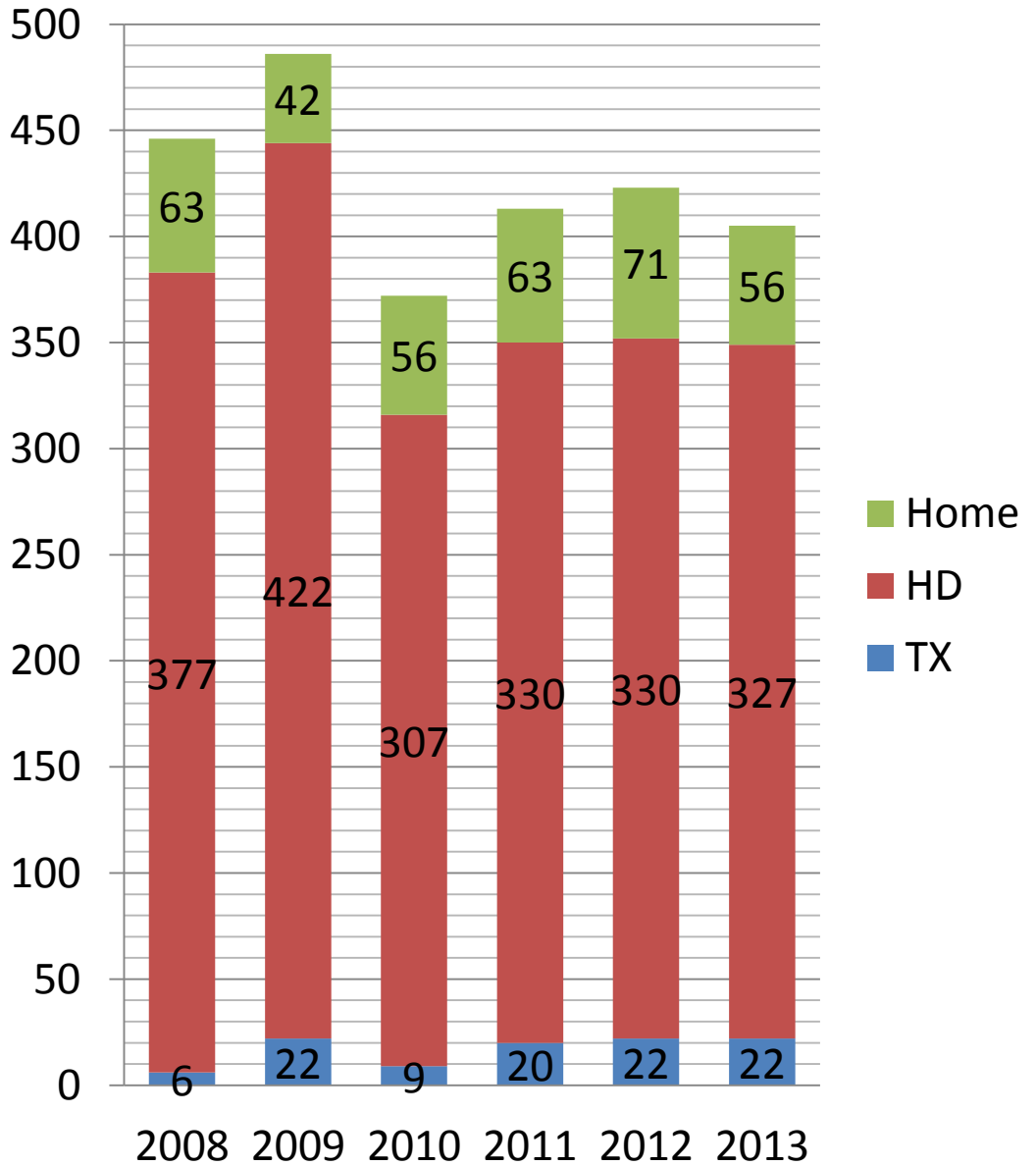
**2014 INCIDENT ESKD PATIENTS
ATTENDING ADULT UNITS**

Incident adult ESKD patients (n)

xxx patients

xx% HD
 xx% PD
 xx% TX

xx p.m.p.



All Island 2013 (Adult)

RoI (4.6)

NI (1.8)

Incident: 88pmp
405

98pmp (95%CI 84-113)
180

HD 81%

67%

PD 14%

22%

TX 5%

11%

**2014 PREVALENT ESKD PATIENTS
ATTENDING ADULT UNITS**

Prevalent ESKD patients (n)

4089 patients

39.8% HD

6.1%

PD/HHD

54.1%

TX

887 p.m.p.

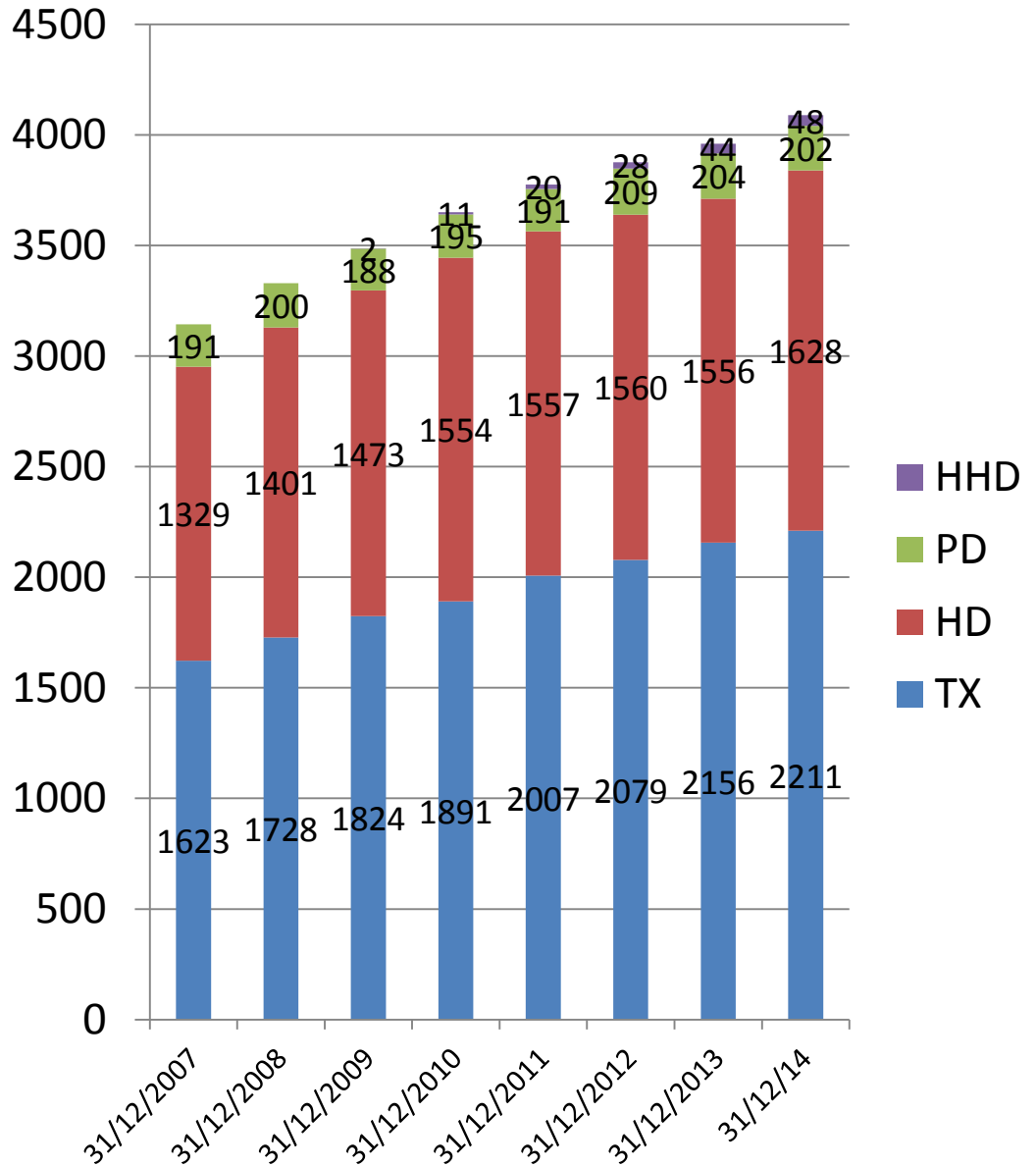
353

HD

54

PD/HHD 480

TX



All Island 2013 (Adult)

RoI (4.6)

NI (1.8)

Prevalent: 862pmp
3960

845pmp (95%CI 803-887)
1546

HD 40%

42%

PD 5%

5%

TX 55%

53%

Change in 2014

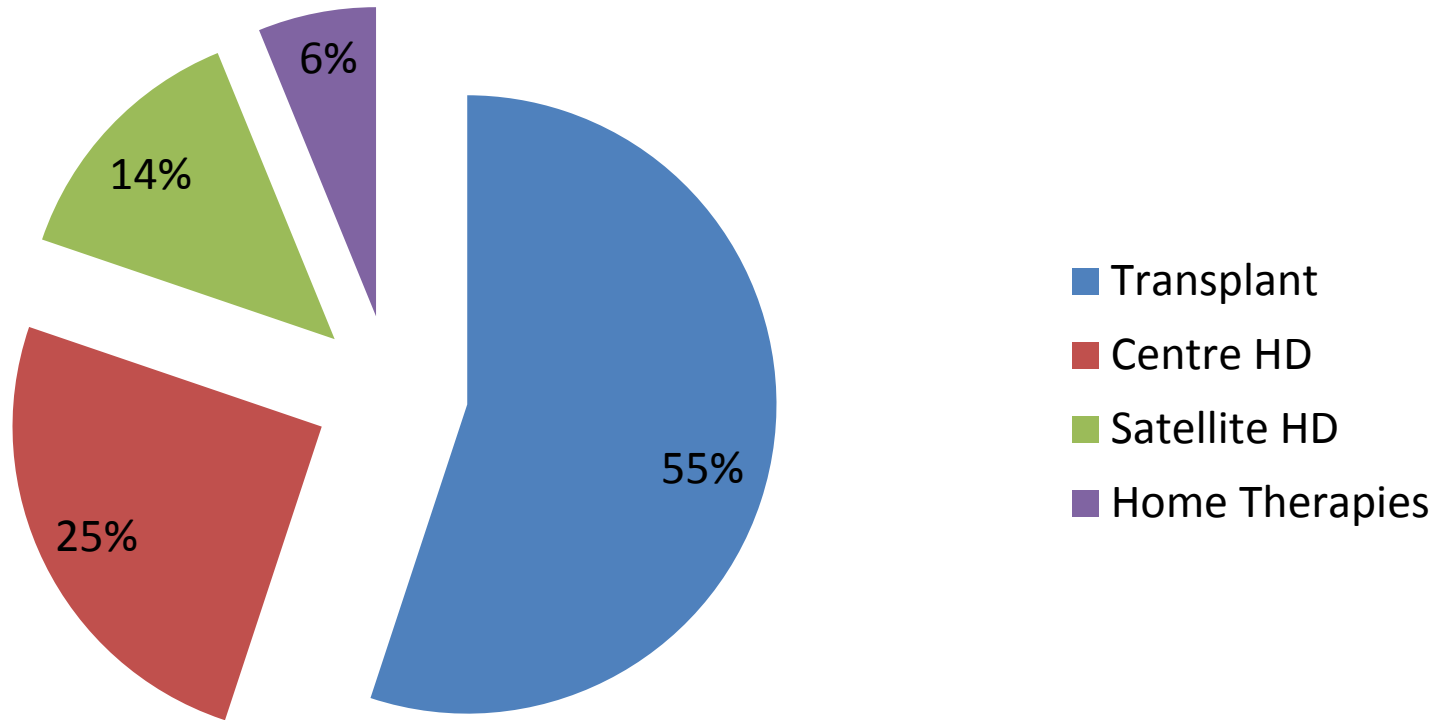
• ESKD	+129	3.3%	28.0 pmp 18.3 pmp
• HD	+72	4.6%	
• PD/HHD	+2	0.8%	
• Dialysis	+74	4.1%	16.1 pmp 1.5 pmp
• TX	+55	2.6%	11.9 pmp 16.8 pmp

Change 2007-14

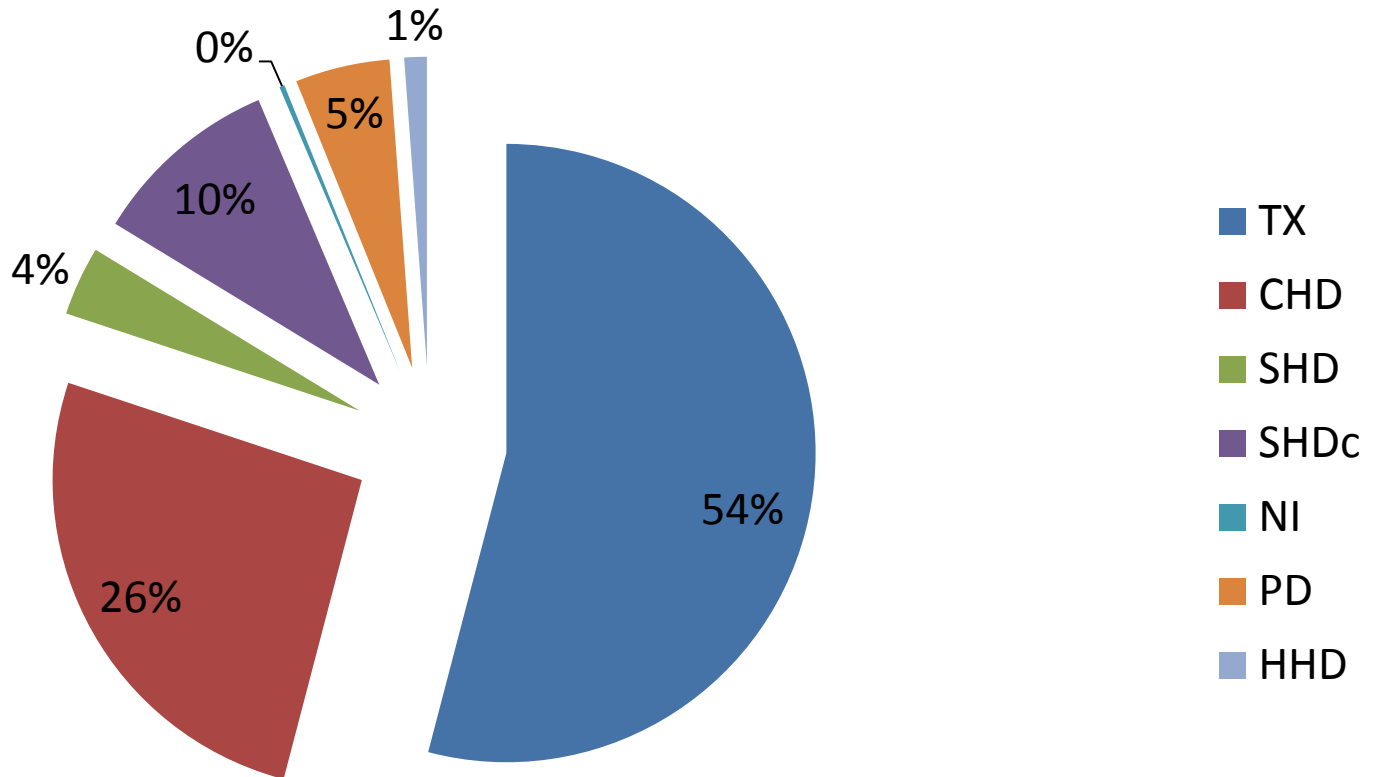
Annualised

• ESKD	+946	30%	+135 (84-186)
• HD	+299	23%	+43 (-4-81)
• PD/HHD	+59	31%	+8 (-10-26)
• Dialysis	+284	19%	+47 (7-97)
• TX	+533	32%	+89 (55-116)

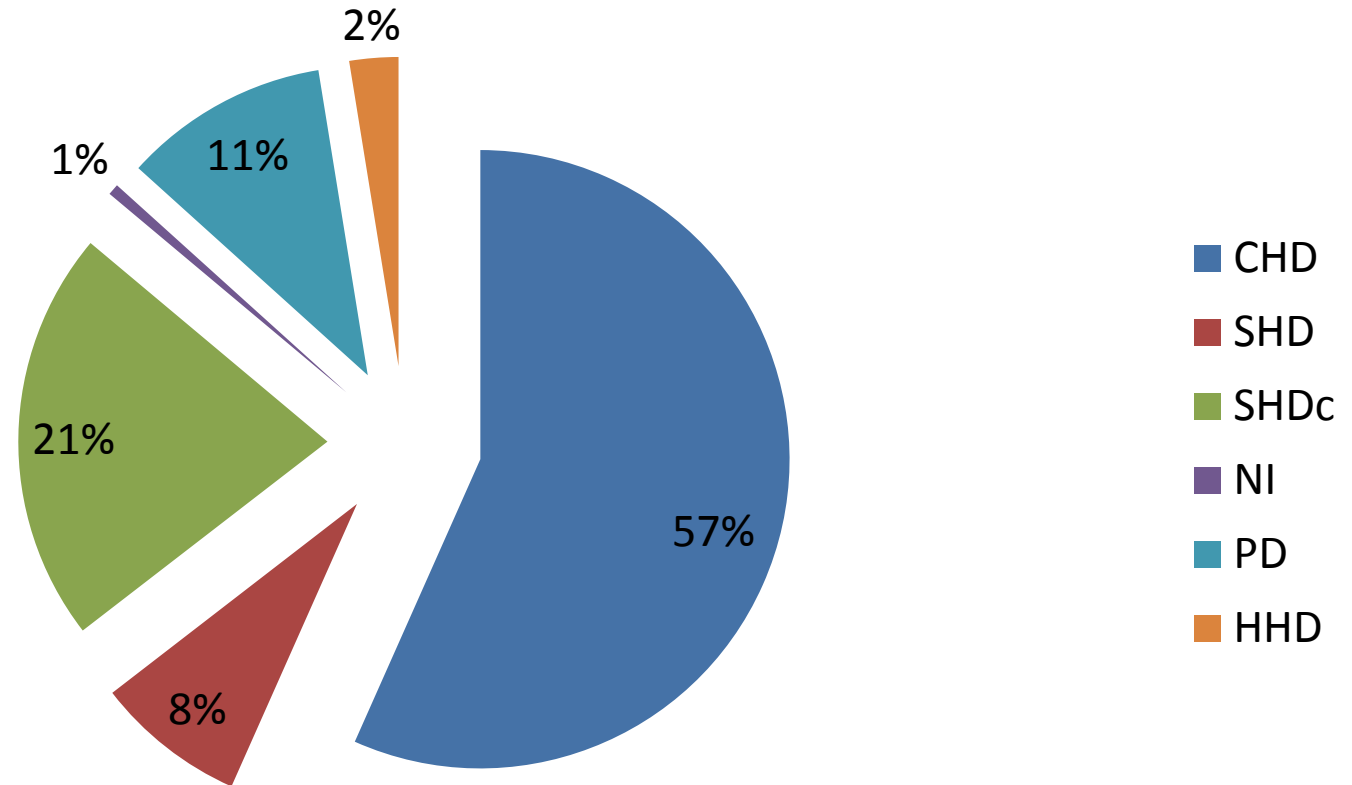
Modalities



Detailed Modalities



Detailed Dialysis Modalities



**REGIONAL ANALYSIS
ESKD PATIENTS ATTENDING
ADULT UNITS**

Renal Services in 6 Hospital Groups

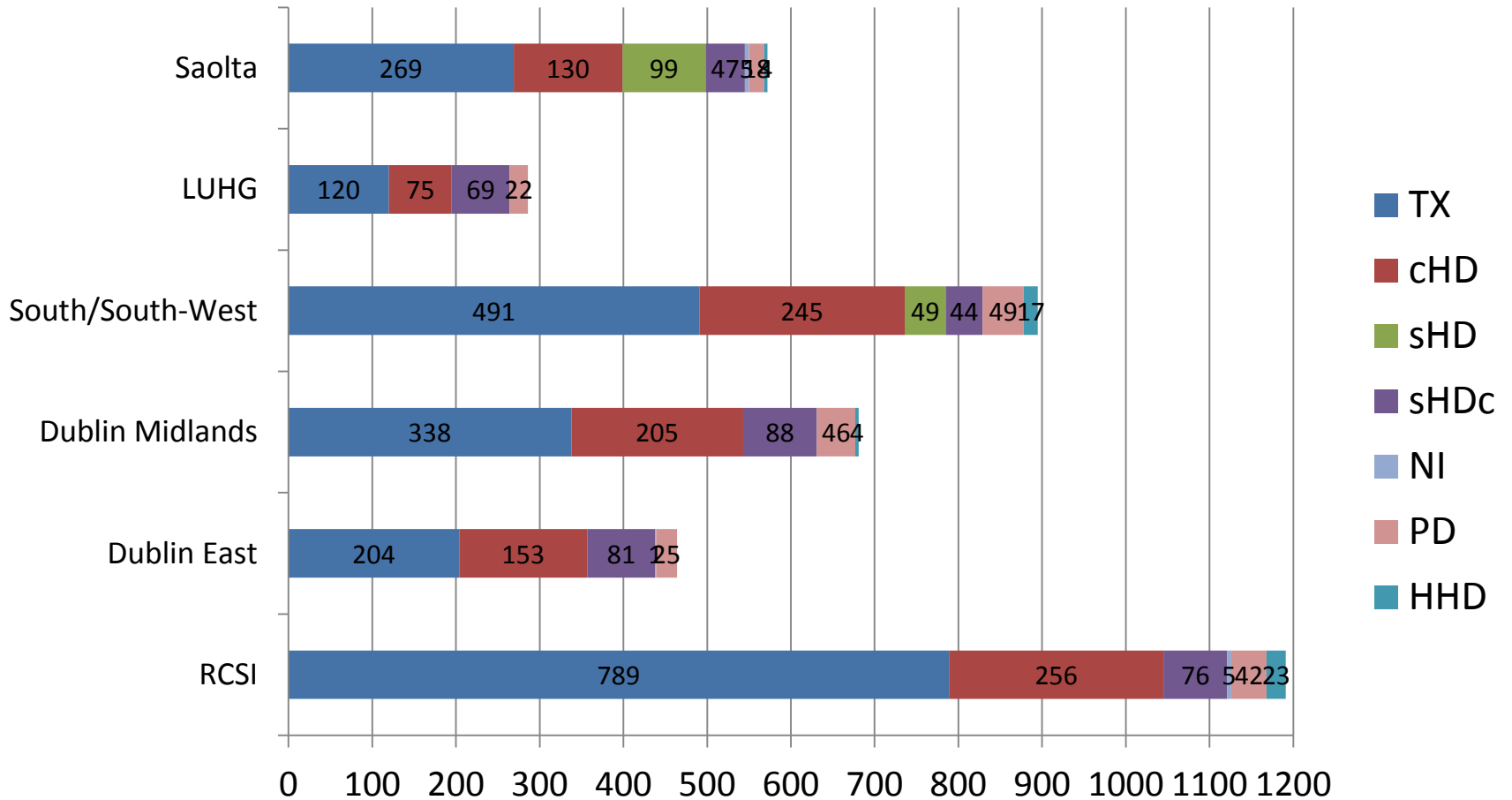
Hospital Group	Renal Units	Contracted Satellite HD Unit	Home Programme
RCSI Hospitals Group (0.8)	BH CGH	Beacon Drogheda fmc Northern Cross	PD/HHD
Dublin East Hospitals Group (0.7)	SVUH MMUH	Beacon Sandyford fmc Northern Cross Beacon Drogheda	PD PD
Dublin Midlands Hospitals Group (0.8)	AMNCH/SJH MRHT	Beacon Tallaght Beacon Sandyford	PD/HHD
South/South West Hospitals Group (1.15)	CUH/KGH WUH	fmc Kilkenny	PD/HHD PD/HHD
University of Limerick Hospitals Group (0.35)	LUH	fmc Limerick	PD
Saolta Healthcare Group (0.8)	MPUH/GUH/MGH LGH/SGH	Wellstone Galway	PD/HHD

NI Renal Units

• Belfast	0.64
• West NI	0.35
• Antrim	0.29
• Ulster	0.27
• Newry	0.26

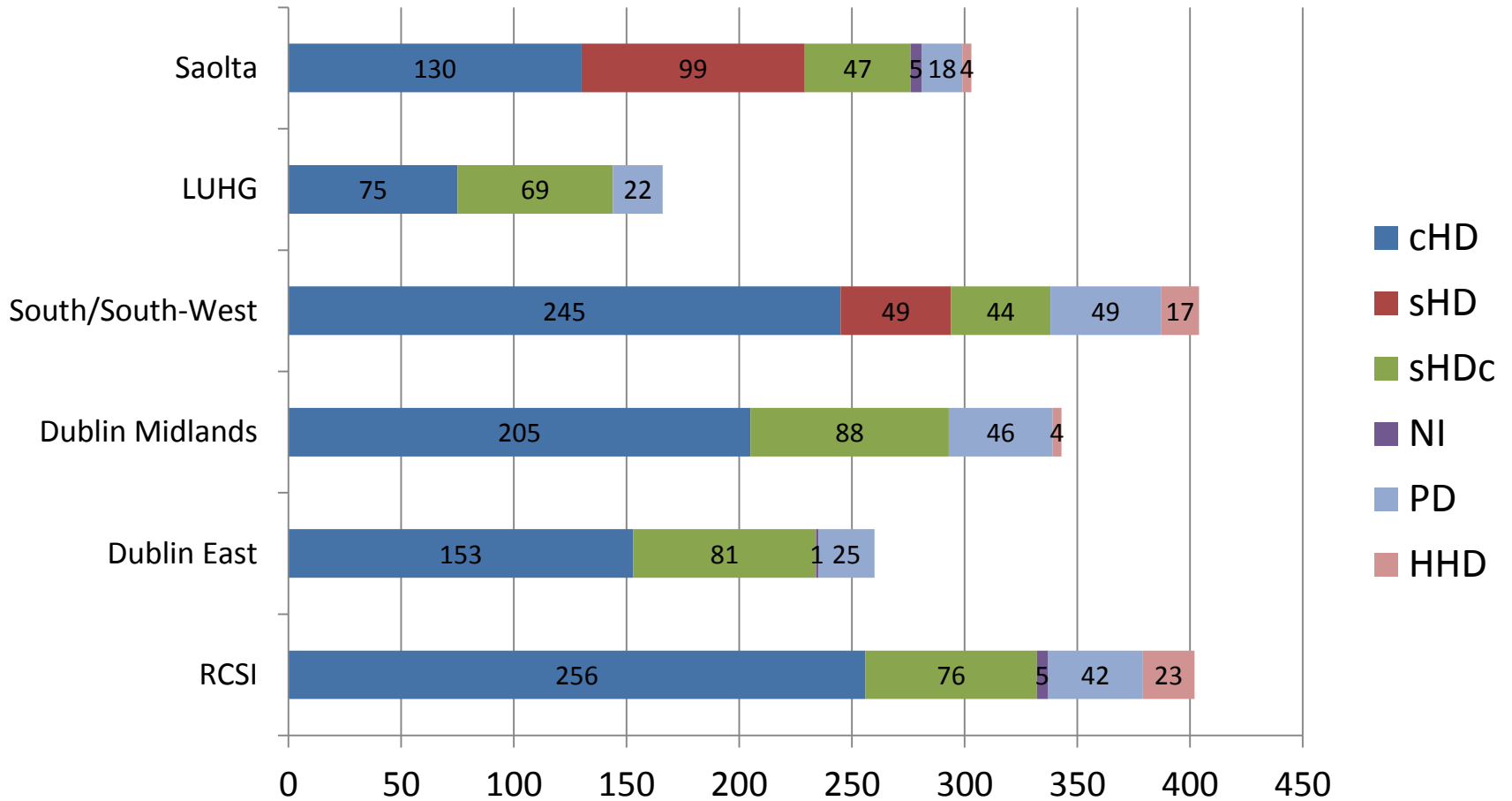
ESKD Patients 31/12/14

(total patients under governance of 6 Hospital Groups)



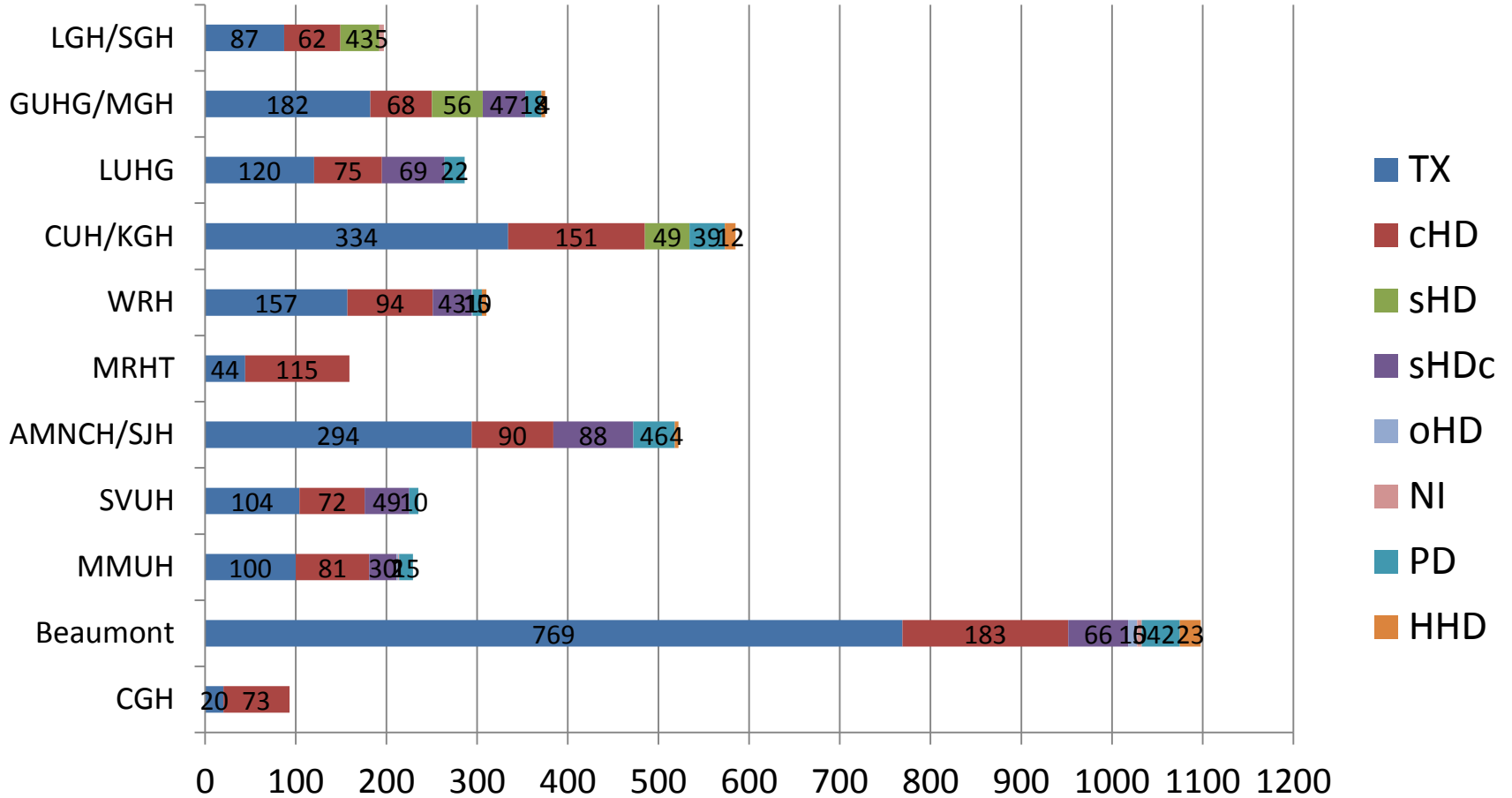
ESKD Patients 31/12/14

(total dialysis patients under governance of 6 Hospital Groups)



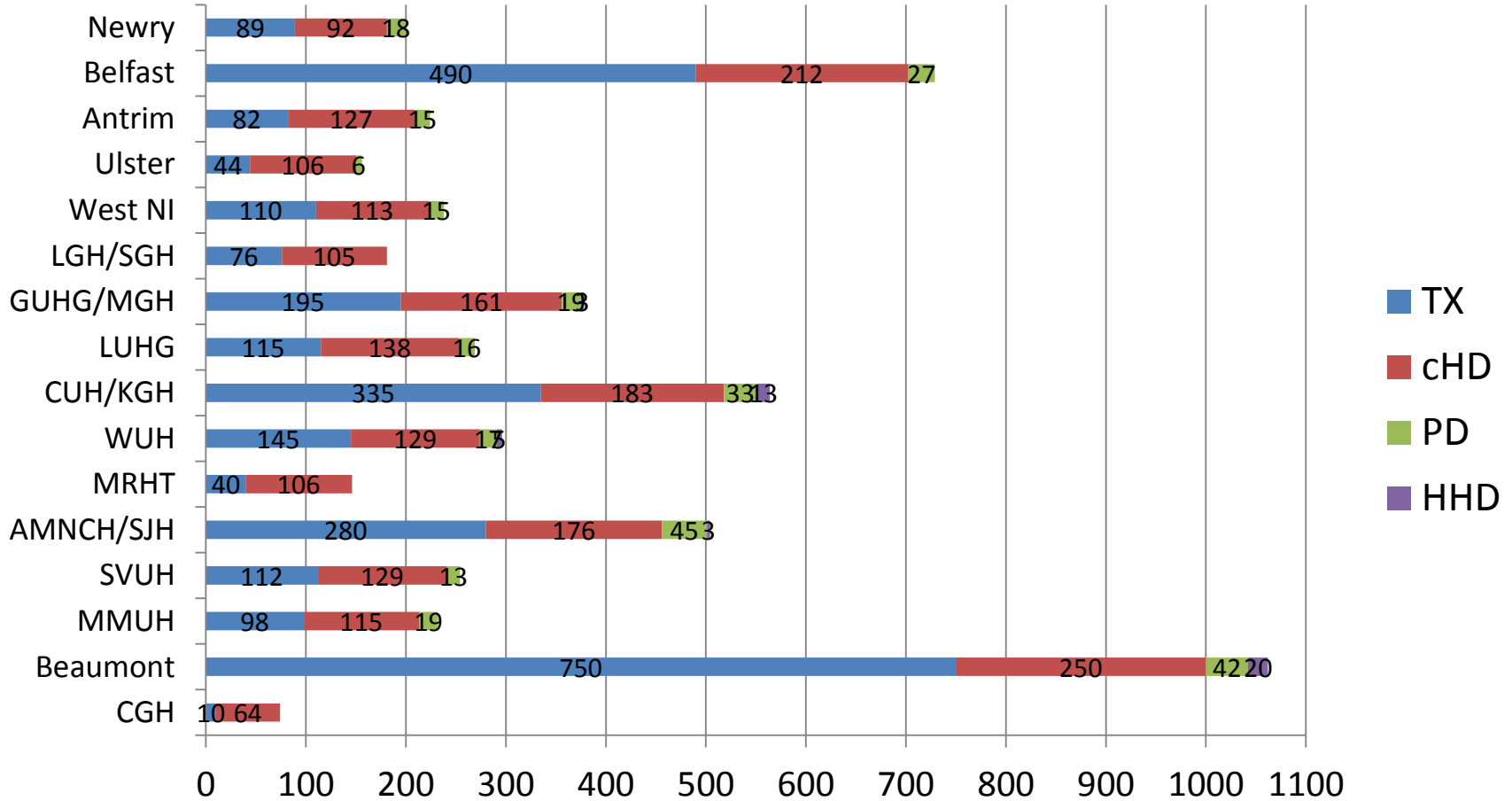
ESKD Patients 31/12/14

(total patients under governance of 11 Parent Units)



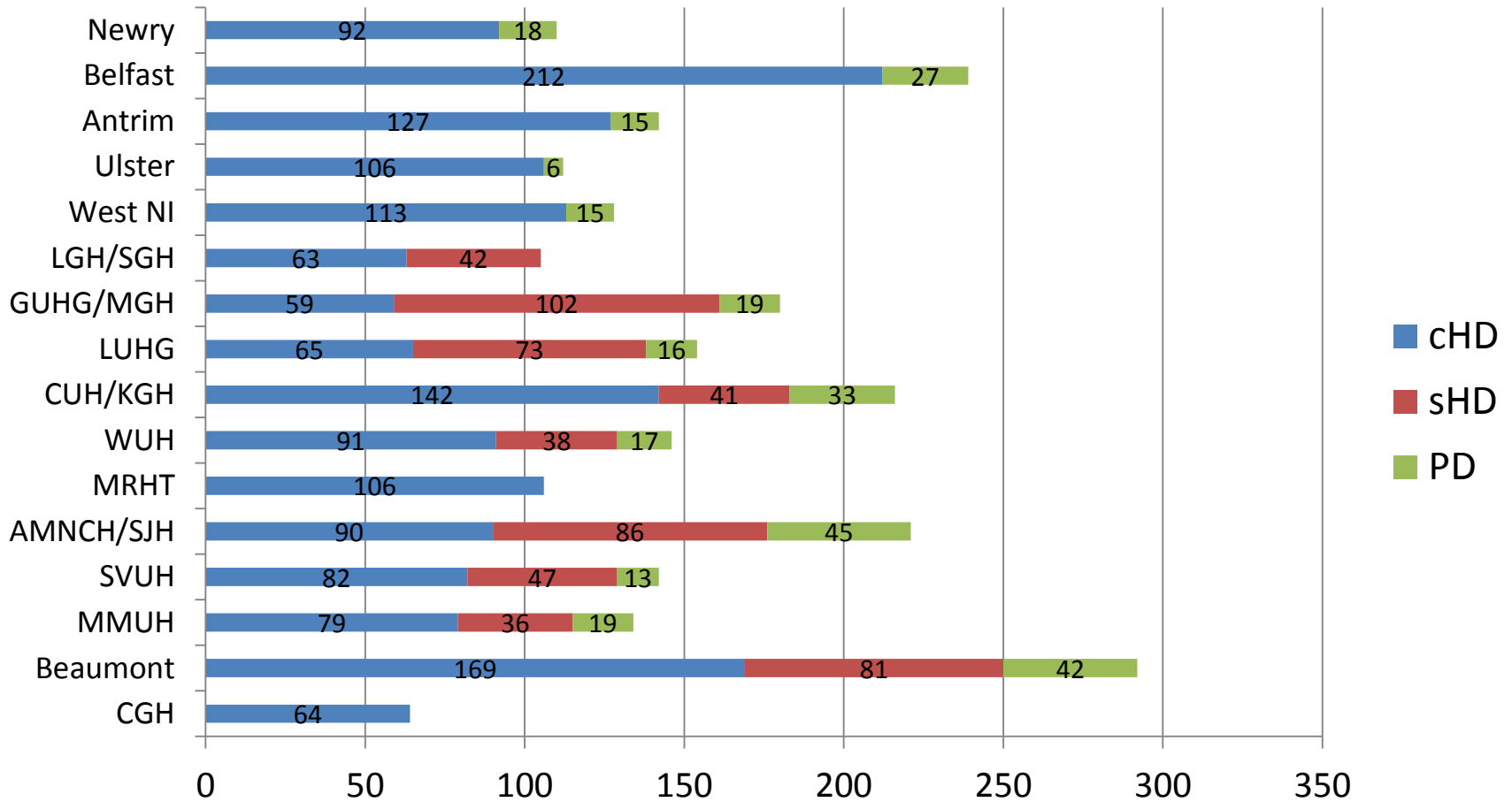
ESKD Patients 31/12/13

(total patients under governance of 16 Parent Units)



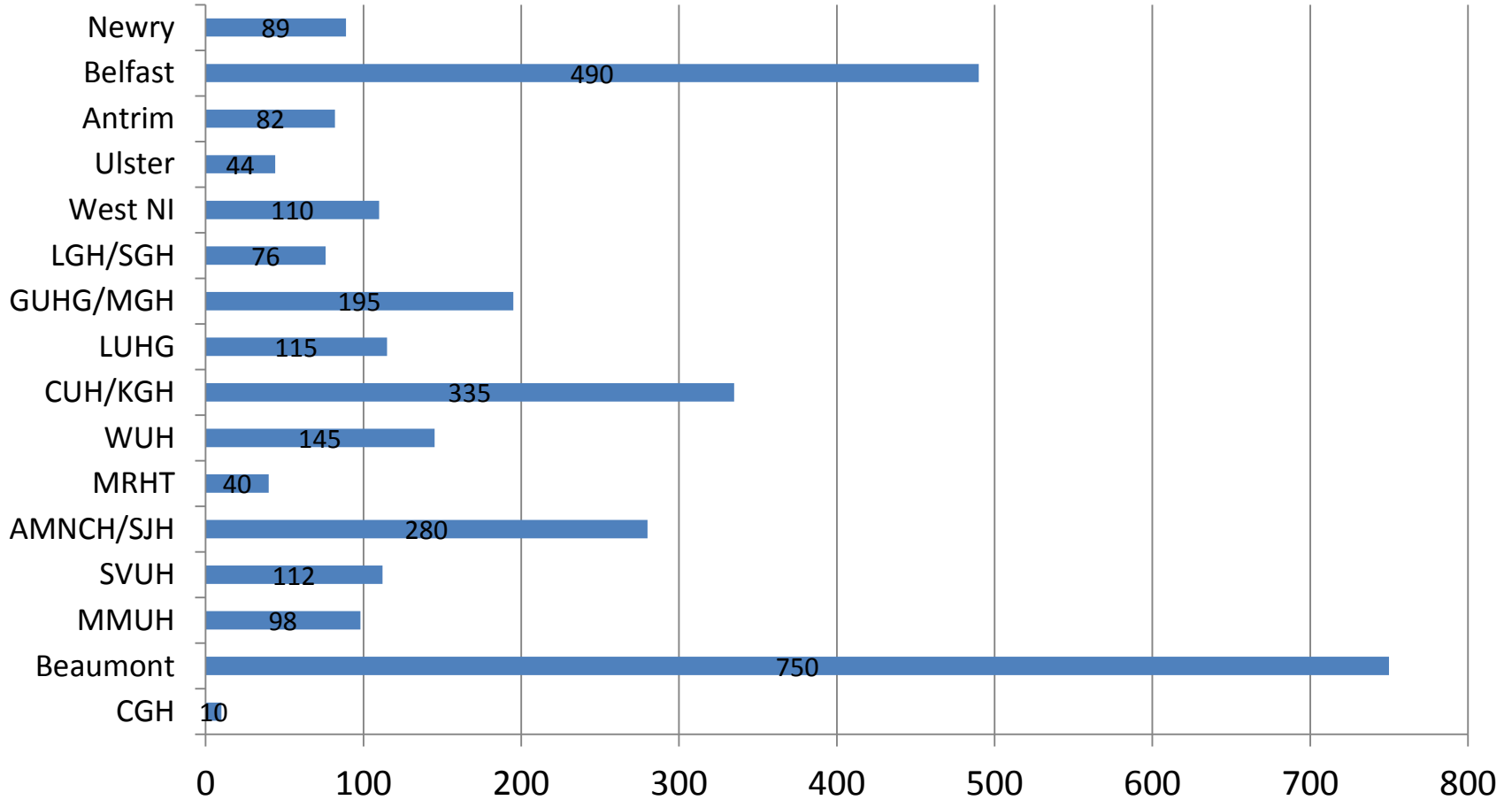
ESKD Patients 31/12/13

(total dialysis patients under governance of 16 Parent Units)



ESKD Patients 31/12/13

(total Tx patients under governance of 16 Parent Units)



**ESKD PATIENTS ATTENDING
PAEDIATRIC UNITS**

Prevalent Paediatric ESKD patients (n)

83 patients

12%

HD

7% PD

81% TX

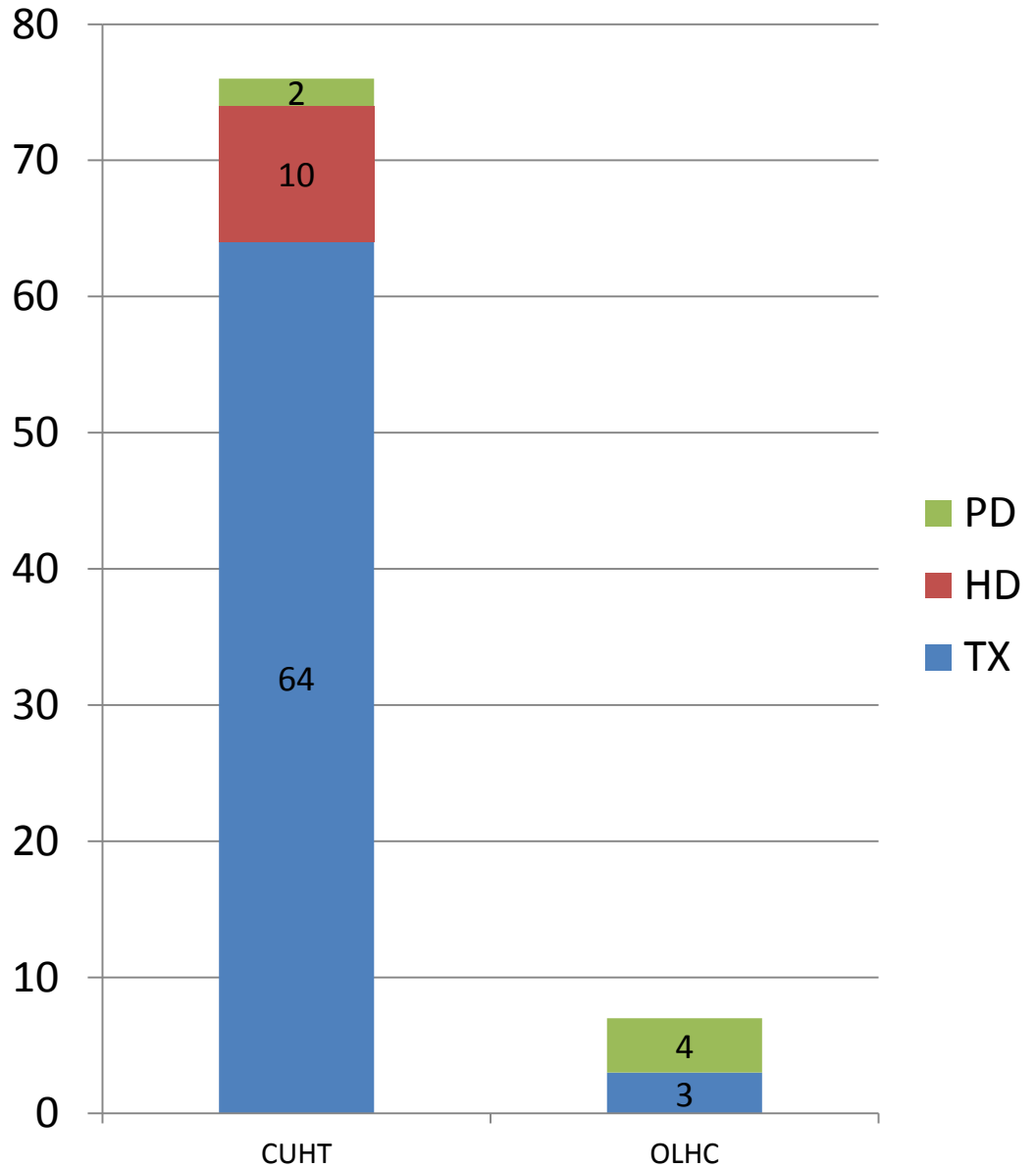
18 p.m.p.

2

HD

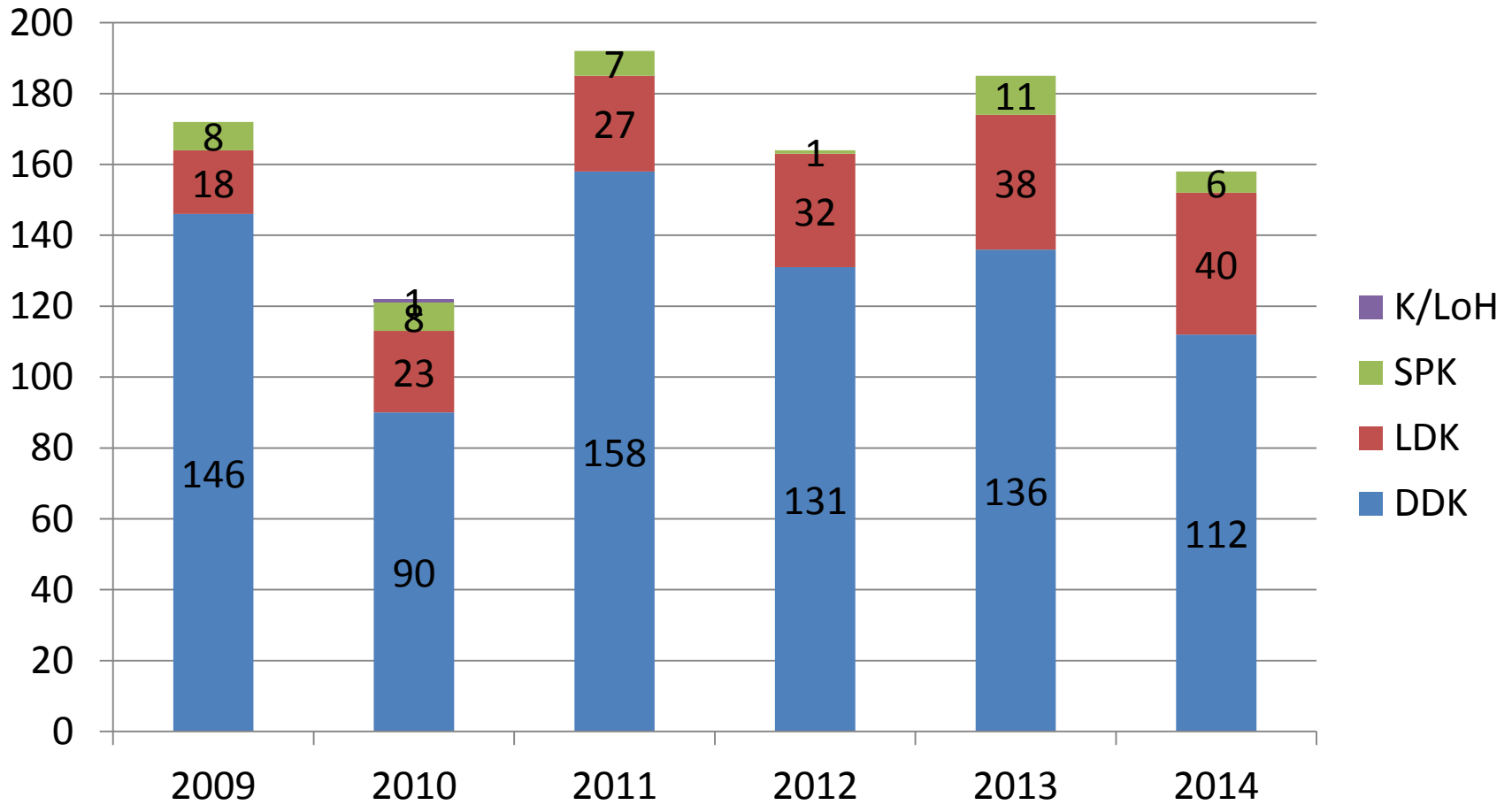
1.3 PD

14.7 TX



TRANSPLANT ACTIVITY

Transplants 2009-14



The Future

Last 5 years reported to USRDS this year
No report to EDTA/ERA Registry or UKRR

Why?

Discipline, Discipline, Discipline.....

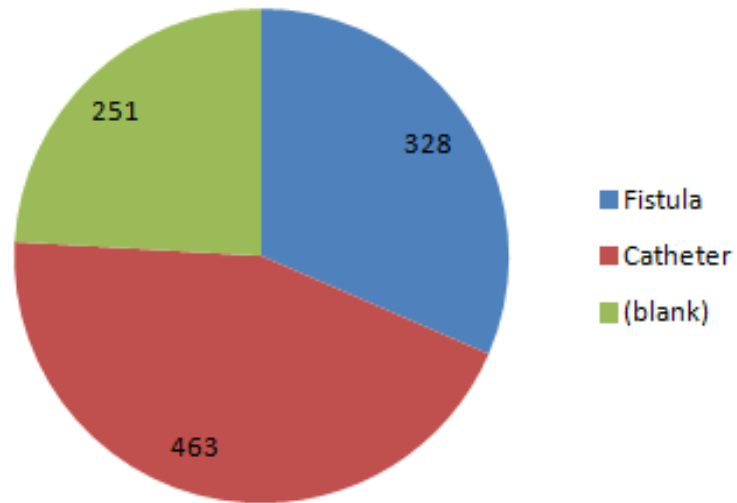
KDCPMS is the tool
Forthcoming Administration Support

National Dataset – From all patients classified as HD, Home Therapy, Transplant follow-up

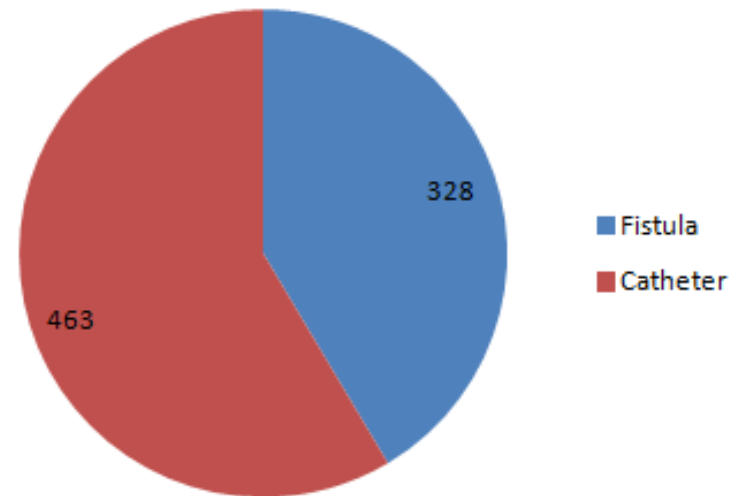
Data Item	Notes
Current Status	HD/ PD/ Tx
Age	HD/ PD/ Tx
Sex	HD/ PD/ Tx
Primary Renal Diagnosis	New EDTA codes
Date of 1 st RRT	First ever RRT
Transplant List Status	HD/ PD/ Tx
Date of Dx Prescription	HD only
Date of Fluid Prescription	HD only
Most recent Dx Date	HD only
Access used in last Dx session	HD only

e.g. Access rates for all-Ireland

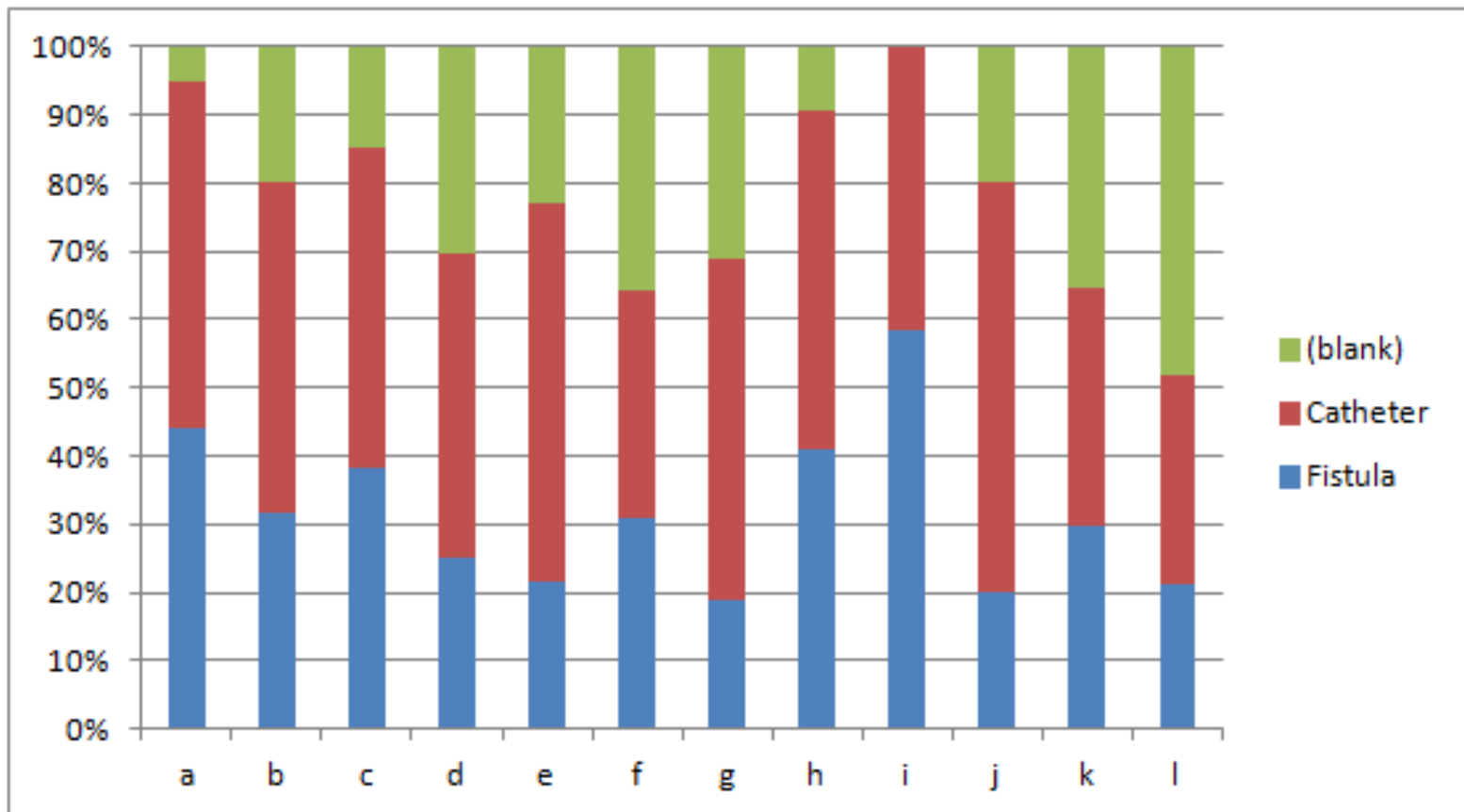
HD Access Documented on Last Dx Treatment



HD Access Documented on Last Dx Treatment



e.g. Fistula vs. Catheter vs. Unrecorded rates in all Units are shown below.



Data completion is challenging

Crucial to get patient classification correct:

Clinical Supervision, Treatment Location, Modality

HD	19	Male	Lupus eryth Primary	21/05/12	12/03/14	Active on lic	30/09/14	16/10/14		
HD	47	Male	Diabetic nej Primary	07/02/13			10/07/14	16/10/14		
HD	61	Male	Chronic cidi Primary	05/09/11			18/02/14	31/05/14		
HD	67	Male	Nephrocalci Primary	01/02/12			10/07/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	67	Male	Obstructive Primary	01/01/00	24/09/12	Active on lic	06/10/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	77	Male		26/10/12			10/03/14	18/08/14	HD Access Catheter-tunnelled - Internal Ju	
HD	73	Male		01/01/00				16/10/14		
HD	68	Male	Obstructive Primary	14/11/13			04/07/14	28/06/14	HD Access Catheter-tunnelled - Right Inten	
HD	82	Male		22/04/14				27/05/14	HD Access Catheter-tunnelled - Right Inten	
HD	44	Female		26/03/14						
HD	78	Female		18/02/14			09/10/14	14/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	72	Male	Obstructive Primary	19/11/13			28/06/14	16/10/14		
HD	67	Male		14/04/14				01/05/14	HD Access Catheter-tunnelled - Right Inten	
HD	66	Male		11/05/12			12/05/14	12/05/14		
HD	60	Male		01/01/00			12/03/14	16/04/14	HD Access Catheter-tunnelled - Internal Ju	
HD	79	Male	IgA nephrop Primary	26/09/12	05/03/14	Not on trans	10/07/14	16/10/14		
HD	79	Male	Lupus eryth Primary	01/01/00			06/10/14	14/10/14	HD Access Catheter-tunnelled - Internal Ju	
HD	36	Male	Diabetic nej Primary	27/12/11			27/09/14	15/10/14	HD Access Catheter-tunnelled - Right Fema	
HD	57	Female		15/04/14						
HD	52	Male	Diabetic nej Primary	18/02/14			10/07/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	76	Female		07/07/14						
HD	50	Male		19/04/14				29/04/14		
HD	63	Female		17/04/14						
HD	75	Male	Type II diabe Primary	11/02/14			25/06/14	15/10/14		
HD	83	Male		23/03/14				06/05/14		
HD	35	Female	Chronic glon Primary	26/04/11	24/05/13	Active on lic	06/10/14	16/10/14	AV Fistula - Left Upper Arm	
HD	76	Female		28/04/14				07/05/14		
HD	72	Male		26/02/14			12/06/14	12/06/14	HD Access Catheter-tunnelled - Right Inten	
HD	67	Female	Chronic ren: Primary	18/07/14			23/08/14	16/10/14		
HD	69	Female	Chronic ren: Primary	01/06/14			16/10/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	68	Male		01/01/00			28/07/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	62	Male		01/01/00				23/09/14	AV Fistula - Left Upper Arm	
HD	61	Male	Myeloma Primary	07/06/14			10/07/14	16/10/14	HD Access Catheter-tunnelled - Right Inten	
HD	54	Male		05/06/14			05/06/14	05/07/14	HD Access Catheter-tunnelled - Left Intern	
HD	59	Male	Type II diabe Primary	17/02/14			09/07/14	15/10/14	HD Access Catheter-tunnelled - Internal Ju	
HD	74	Female		05/09/14			05/09/14	05/09/14	HD Access Catheter-tunnelled - Right Inten	
HD	75	Male	Type II diabe Primary	27/02/00			06/10/14	16/10/14	HD Access Catheter-tunnelled - Internal Ju	
HD	66	Male		21/06/14			03/07/14	24/07/14		
HD	63	Female	Chronic mes Primary	12/03/14			15/10/14	15/10/14		
HD	39	Male		19/03/14						
HD	38	Male		21/03/14			08/08/14	11/08/14	HD Access Catheter-tunnelled - Right Inten	
HD	35	Female	Chronic ren: Primary	20/05/14			12/06/14	14/10/14		
HD	57	Male		20/06/14				28/06/14	HD Access Catheter-tunnelled - Right Inten	

Snapshot of raw data extract showing complete data in green and incomplete data in red

Census Reporting Protocol

1. All units review and validate their records
Start with Lead Nephrologist and Renal System Admin (RSA) checking classification and lists
2. NRO issues a “% completion” report for all units
(missing data)
3. Lead Nephrologist and RSA complete the minimum dataset for all
4. NRO extracts report 23hrs 31st December 2015