



Chapter 3

Organ Donation Pathway



2015
ANZOD Registry
Annual Report
Data to 31-Dec-2014



Organ Donation Pathway

This chapter reports on the organ donation pathway from identification of a donor to the outcome of the donation. This includes the known intention to be an organ donor; cause of death and events leading up to admission to hospital; who sought authority to donate; whether the donation did not proceed or proceeded down the donation after brain death or donation after circulatory death pathway, the maintenance and terminal treatment of the donor and the outcome of the retrieval procedure resulting in transplantation of donated organs.

Table 3.1 shows the number in 2014 of donors enrolled on the Australian Organ Donor Register, which commenced in 2000.

Table 3.1

Donors Enrolled on the Australian Organ Donor Registry 2014 (2013)									
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUST
Yes	18 (20)	45 (31)	5 (3)	24 (21)	4 (4)	12 (15)	1 (2)	9 (17)	118 (113)
Not Applicable	1 (7)	1 (7)	0 (0)	1 (2)	0 (0)	0 (0)	0 (0)	0 (9)	3 (25)
No	42 (0)	30 (2)	5 (0)	82 (1)	5 (0)	17 (1)	2 (0)	24 (0)	207 (4)
Not Registered	6 (47)	14 (61)	1 (3)	6 (82)	0 (4)	5 (18)	2 (5)	0 (21)	34 (241)
Not Accessed	4 (3)	2 (1)	0 (0)	4 (4)	0 (0)	2 (0)	2 (0)	2 (0)	16 (8)
Unknown	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)
Total	71 (77)	92 (102)	11 (6)	117 (110)	9 (8)	36 (34)	7 (7)	35 (47)	378 (391)

The Australian Organ Donor Register (the Donor Register) is managed by the Department of Human Services on behalf of the Australian Government. The Donor Register is the only national register for people to record their decision about becoming an organ and tissue donor for transplantation after death. Registering is voluntary and people have complete choice over which organs and tissues they wish to donate. If a person does not want to become an organ and tissue donor, they can register their decision not to donate on the Donor Register which is available at <http://www.medicareaustralia.gov.au/provider/patients/aodr/index.jsp>



Coroner's Cases

Table 3.2 shows the number of donor cases subject to Coronerial inquiry. In Australia, 44% of donors in 2014 were subject to Coronerial inquiry, compared to 48% in 2013. In New Zealand it was 50% for 2014 and 28% in 2013 (Table 3.2).

Table 3.2

Coroner's Cases 2010 - 2014										
	Australia					New Zealand				
	2010	2011	2012	2013	2014	2010	2011	2012	2013	2014
Yes	121	141	153	187	167	18	16	19	10	23
No	188	196	201	204	211	23	22	19	26	23
Total	309	337	354	391	378	41	38	38	36	46

Table 3.3 shows the number of Australian Coroner's cases by jurisdiction and the number of Coroner's cases in New Zealand for 2014 compared to 2013.

Table 3.3

Australian Coroner's Cases by State 2014 (2013)										
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUST	NZ
Yes	37 (42)	28 (44)	6 (3)	59 (44)	3 (6)	19 (17)	2 (5)	13 (26)	167 (187)	23 (10)
No	34 (35)	64 (58)	5 (3)	58 (66)	6 (2)	17 (17)	5 (2)	22 (21)	211 (204)	23 (26)
Total	71 (77)	92 (102)	11 (6)	117 (110)	9 (8)	36 (34)	7 (7)	35 (47)	378 (391)	46 (36)



Organ Donation Pathway

Cause of Death - All Donors

In Australia and New Zealand, road trauma continues to be a reducing cause of death while cerebrovascular accident (CVA) has been increasing in Australia since 1989, although in New Zealand figures have remained steady.

In Australia for the period 2010 - 2014, CVA accounted for an overall 48% of donor deaths and road trauma for 9%.

Table 3.4 shows the cause of death by percentage in Australia and each Australian State and New Zealand over the last five years.

Table 3.4

Cause of Donor Death by State/Country 2010 - 2014										
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUST	NZ
CVA	46	48	55	49	54	51	57	46	48	51
Trauma (road)	14	12	17	7	2	14	11	16	11	13
Trauma (non-road)	12	12	6	6	10	8	4	8	9	13
Hypoxia-Anoxia	21	24	21	32	17	21	21	23	25	16
Cerebral Tumour	1	1	0	0	0	0	0	1	0	1
Other	6	5	0	6	17	6	7	6	6	7

Table 3.5 shows the cause of death of donors by age group in 2014 in Australia and New Zealand. In 2014, CVA was the main cause of death in donors 35-54 years and 55 years and older, in both Australia and New Zealand, whereas in the younger 15-34 year age group and 14 years and younger, Hypoxia-Anoxia accounted for 30% of all deaths in Australia and 17% in New Zealand.

Table 3.5

Cause of Donor Death by Age Group 2014										
	Australia					New Zealand				
	Age Groups				Total	Age Groups				Total
	0-14	15-34	35-54	>=55		0-14	15-34	35-54	>=55	
CVA	1	16	63	101	181 (48%)	0	0	11	9	20 (43%)
Trauma (road)	4	14	10	6	34 (9%)	0	2	3	0	5 (11%)
Trauma (non-road)	1	6	10	8	25 (7%)	2	4	1	3	10 (22%)
Hypoxia-Anoxia	7	31	49	27	114 (30%)	0	4	2	2	8 (17%)
Cerebral Tumour	1	0	0	0	1 (0%)	0	0	0	0	0 (0%)
Other	0	8	14	1	23 (6%)	0	1	1	1	3 (7%)
Total	14	75	146	143	378	2	11	18	15	46

Organ Donation Pathway

The cause of death by age group is shown in Table 3.6 for each Australian State for 2014.

Table 3.6

Cause of Death by Age Group for Australian States 2014						
		Age Groups				Total
		0-14	15-34	35-54	>=55	
Queensland	CVA	0	6	14	13	33
	Trauma (road)	1	3	1	1	6
	Trauma (non-road)	0	2	3	2	7
	Hypoxia-Anoxia	4	8	5	2	19
	Other	0	2	3	1	6
	Total	5	21	26	19	71
New South Wales	CVA	1	1	12	35	49
	Trauma (road)	0	2	2	2	6
	Trauma (non-road)	0	2	4	3	9
	Hypoxia-Anoxia	1	8	8	8	25
	Other	0	1	2	0	3
	Total	2	14	28	48	92
Australian Capital Territory (ACT)	CVA	0	0	1	4	5
	Trauma (road)	0	1	0	2	3
	Trauma (non-road)	0	1	0	0	1
	Hypoxia-Anoxia	0	0	2	0	2
	Other	0	0	0	0	0
	Total	0	2	3	6	11
Victoria	CVA	0	5	18	25	48
	Trauma (road)	2	5	2	0	9
	Trauma (non-road)	1	1	3	1	6
	Hypoxia-Anoxia	0	10	22	14	46
	Other	0	2	6	0	8
	Total	3	23	51	40	117
Tasmania	CVA	0	1	2	2	5
	Trauma (road)	0	0	0	0	0
	Trauma (non-road)	0	0	0	0	0
	Hypoxia-Anoxia	0	0	1	0	1
	Other	0	1	2	0	3
	Total	0	2	5	2	9
South Australia	CVA	0	1	5	11	17
	Trauma (road)	1	1	3	1	6
	Trauma (non-road)	0	0	0	1	1
	Hypoxia-Anoxia	0	3	5	2	10
	Other	0	1	1	0	2
	Total	1	6	14	15	36
Northern Territory	CVA	0	0	3	1	4
	Trauma (road)	0	0	0	0	0
	Trauma (non-road)	0	0	0	0	0
	Hypoxia-Anoxia	1	1	1	0	3
	Other	0	0	0	0	0
	Total	1	1	4	1	7
Western Australia	CVA	0	2	8	10	20
	Trauma (road)	0	2	2	0	4
	Trauma (non-road)	0	0	0	1	1
	Hypoxia-Anoxia	1	1	5	1	8
	Other	1	1	0	0	2
	Total	2	6	15	12	35



Organ Donation Pathway

Cardiopulmonary Resuscitation

Cardiopulmonary resuscitation is recorded for events leading up to the admission and hospital stay for the patient, prior to organ donation.

Table 3.7 shows the number of recorded events for cardiopulmonary resuscitation for Australia and New Zealand donors

Table 3.7

Cardiopulmonary Resuscitation 2010 - 2014										
	Australia					New Zealand				
	2010	2011	2012	2013	2014	2010	2011	2012	2013	2014
Yes	112	111	130	155	170	15	13	14	8	14
No	197	226	224	234	207	26	25	24	27	32
Unknown	0	0	0	2	1	0	0	0	1	0
Total	309	337	354	391	378	41	38	38	36	46

Table 3.8

Australian States Cardiopulmonary Resuscitation by State 2014 (2013)								
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA
Yes	29 (31)	36 (42)	2 (1)	63 (47)	3 (3)	18 (7)	3 (4)	16 (20)
No	42 (46)	55 (59)	9 (5)	54 (63)	6 (5)	18 (27)	4 (3)	19 (26)
Unknown	0 (0)	1 (1)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (1)
Total	71 (77)	92 (102)	11 (6)	117 (110)	9 (8)	36 (34)	7 (7)	35 (47)

Organ Donation Pathway



Authority Sought for Organ Donation

The predominant group requesting authority for organ donation in 2014 were the Intensive Care Clinicians and Registrars, 55% in Australia and 80% in New Zealand shown in Table 3.11.

In Australia, authority for organ donation was sought by a Donor Specialist on 45 (12%) occasions which is a further marked increase from previous years (Table 3.11). Authority for organ donation in New Zealand was sought by a Donor Coordinator in two cases.

In 2014, 30% of families volunteered authority for organ donation in Australia (26% in 2013), up 5%, compared to 26% in 2013. In New Zealand, 11% of families volunteered authority in 2014 (14% in 2013). (Table 3.9)

See Table 3.10 for individual State and Territory statistics.

Table 3.9

Authority to Donate 2010 - 2014										
	Australia					New Zealand				
	2010	2011	2012	2013	2014	2010	2011	2012	2013	2014
Donor Specialist	2	1	1	21	45	0	0	0	1	2
ICU Consultant	200	179	214	242	186	29	31	33	28	35
ICU Registrar	13	18	15	13	23	1	1	1	0	2
Social Worker	1	0	0	0	1	0	0	0	0	0
Other	1	1	2	5	1	1	1	1	2	1
Volunteered	82	123	111	100	112	9	5	2	5	5
Nursing Staff	1	1	4	2	1	1	0	0	0	1
Emergency Clinician	9	14	7	8	9	0	0	1	0	0
TOTAL	309	337	354	391	378	41	38	38	36	46

Table 3.10

Authority to Donate by State 2014 (2013)								
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA
Donor Specialist	8 (3)	19 (15)	2 (1)	7 (0)	1 (0)	2 (1)	3 (0)	3 (1)
ICU Clinician	34 (41)	41 (76)	3 (4)	56 (61)	2 (3)	26 (29)	2 (7)	22 (21)
ICU Registrar	4 (0)	5 (2)	0 (0)	11 (5)	0 (0)	1 (1)	0 (0)	2 (5)
Social Worker	0 (0)	1 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)
Other	0 (1)	1 (2)	0 (0)	0 (0)	0 (1)	0 (0)	0 (0)	0 (1)
Volunteered	23 (31)	22 (4)	6 (1)	40 (42)	5 (3)	7 (3)	2 (0)	7 (16)
Nursing Staff	1 (0)	0 (0)	0 (0)	0 (0)	0 (1)	0 (0)	0 (0)	0 (1)
Emergency Clinician	1 (1)	3 (3)	0 (0)	3 (2)	1 (0)	0 (0)	0 (0)	1 (2)
TOTAL	71 (77)	92 (102)	11 (6)	117 (110)	9 (8)	36 (34)	7 (7)	35 (47)



Organ Donation Pathway

Donation Not Proceeding

An intended donor is a person for whom authority has been given, but organ donation did not proceed. A donation may not proceed due to positive virology tests, cardiac arrest or further investigations discovered a cancer or infection. In 2014, as with previous years, the main reason donors do not proceed to organ donation was because the time to cardiac standstill for DCD was exceeded.

Table 3.11 represents the number of non-proceeding donors for each State/Territory and overall for Australia and New Zealand compared to the number of actual donors who did proceed to theatre for organ donation. In Australia, there were 91 donors who did not proceed down the pathway of solid organ donation and in New Zealand there were three. The reasons for this are described in Table 3.12.

Table 3.11

Actual vs Intended (Non - Proceeding) Donors 2014										
	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUS	NZ
Intended Donor	14 (16%)	22 (19%)	2 (15%)	39 (25%)	2 (18%)	5 (12%)	1 (13%)	6 (15%)	91 (19%)	3 (6%)
Actual Donor	71 (84%)	92 (81%)	11 (85%)	117 (75%)	9 (82%)	36 (88%)	7 (88%)	35 (81%)	378 (81%)	46 (94%)

Table 3.12

Reasons Why Donation Did Not Proceed 2014	
Australia and New Zealand	
Did not proceed to cardiac standstill (DCD donors)	22
Disease in organ	17
Extended ischaemic time	15
No suitable recipients on waiting list	10
Other	8
Infection in donor	5
Malignancy in donor	5
Medically unsuitable results	4
Consent withdrawn by donor family	3
Cardiac arrest	3
Trauma to organs	1
Logistics	1
Total Non-Proceeding Donors	94



Organ Donation Pathway

Donation After Circulatory Death

The majority of organs are donated by the Donation after Brain Death (DBD) pathway. After certification of brain death, the donor remains on the ventilator and the removal of organs may occur many hours later.

The Donation after Circulatory Death (DCD) pathway is defined by patients with irreversible cessation of circulation. As soon as cessation of circulation is confirmed the retrieval procedure is commenced in order to minimise warm ischaemic time.

The number of DCD donors since 1989 has risen to 556 donors for Australia and 17 DCD donors for New Zealand.

In Australia, in 2014, there were 107 DCD donors; 47 in Victoria, 27 in New South Wales, 20 in Queensland, four each in South Australia and Western Australia, three in the Australian Capital territory and two in Northern Territory. There were six DCD donors, in New Zealand in 2014. (Table 3.15)

The first multi-organ DCD was performed in South Australia in 2006.

In 2014, the mean age for a DCD donor was 47.4 years and the age range was 7.1 to 69.7 years, in Australia. In New Zealand the mean age of DCD was 46.2 years and the age range was 18 years to 59 years.

Causes of death leading to DCD in Australia, in 2014 were CVA (37), hypoxia-anoxia (45), road trauma (11), other trauma (9) and other causes (5). In New Zealand, the leading cause of death was hypoxia in 50% (3) of DCD donors.

In 2014, the first heart was donated after circulatory death and successfully transplanted in NSW.

Table 3.13

Donation After Circulatory Death by State/Country 2010 - 2014										
YEAR	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUST	NZ
2010	13	24	3	24	0	5	0	0	69	1
2011	18	18	2	32	0	8	1	7	86	2
2012	16	19	2	30	0	4	1	5	77	0
2013	24	15	0	35	3	2	2	5	86	2
2014	20	27	3	47	0	4	2	4	107	6



Organ Donation Pathway

Time from Admission to Brain Death

AUSTRALIA

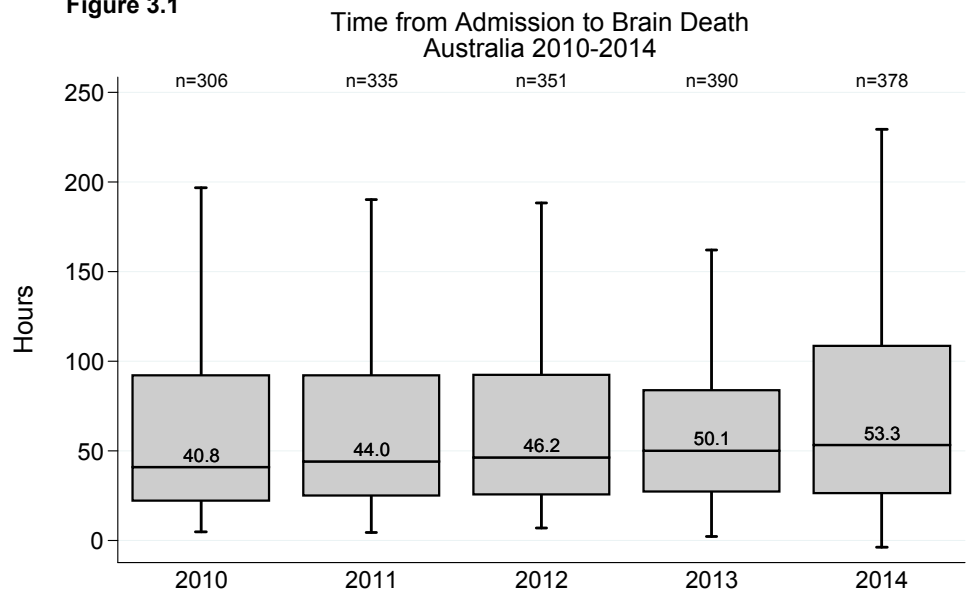
In 2014, 20% of Australian donors were declared brain dead within 24 hours of hospital admission.

Time of admission to hospital was unknown for only two donors.

The median time from admission to brain death was 53.3 hours.

Twenty one percent of donors (78) were in hospital for more than five days.

Figure 3.1



NEW ZEALAND

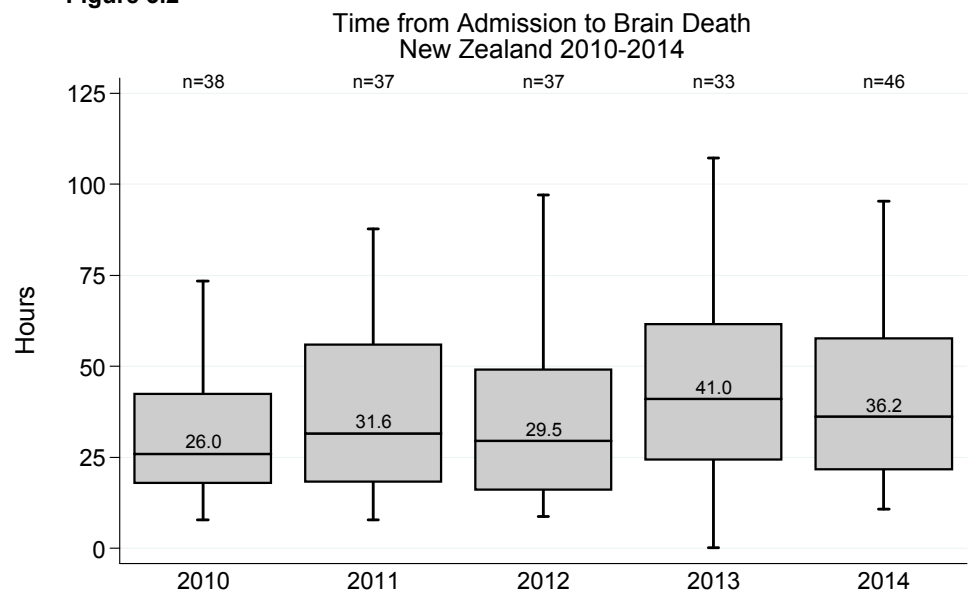
In 2014, 33% of New Zealand donors were declared brain dead within 24 hours of hospital admission.

Time of admission to hospital was unknown for two donors.

The median time from admission to brain death was 36.2 hours.

Four percent of donors (two) were in hospital for more than five days.

Figure 3.2



* For DCD donors, this is the time from admission to circulatory death

** Excluded from analysis are donors in Australia and New Zealand where no admission date was reported.



Time from Ventilation to Brain Death

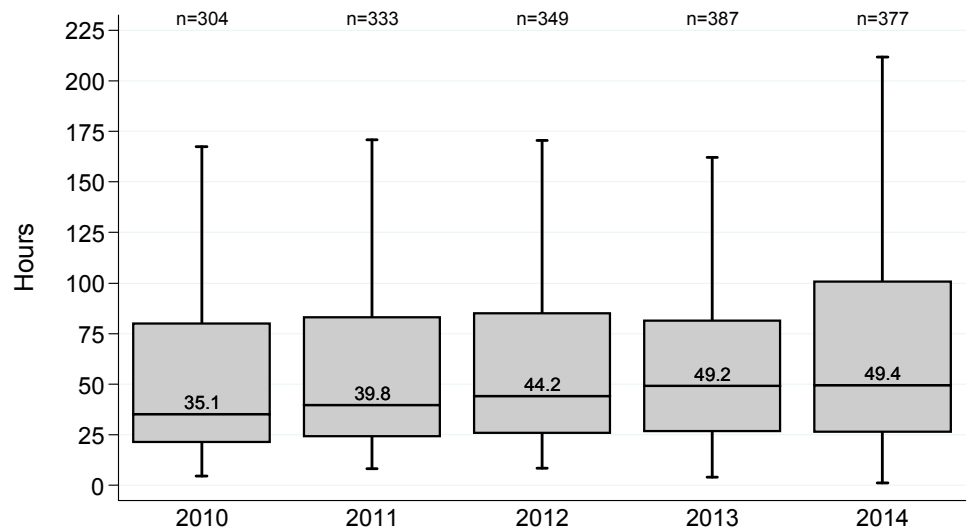
AUSTRALIA

In 2014, the median time from ventilation to brain death was 49.4 hours.

The time of ventilation was unknown for four Australian donors.

Figure 3.3

Time from Ventilation to Brain Death
Australia 2010-2014



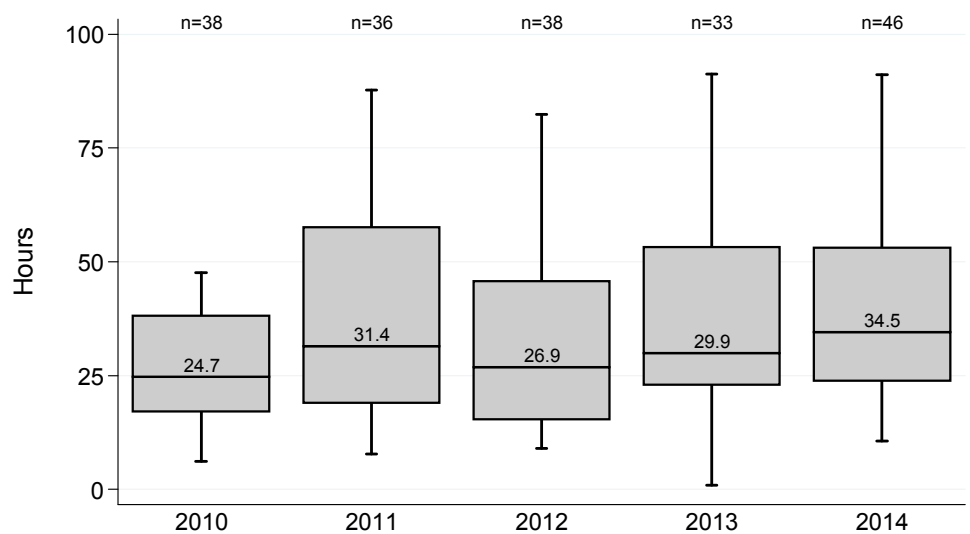
NEW ZEALAND

The median time in New Zealand from ventilation to brain death was 34.5 hours.

The time of ventilation was unknown for three New Zealand donors.

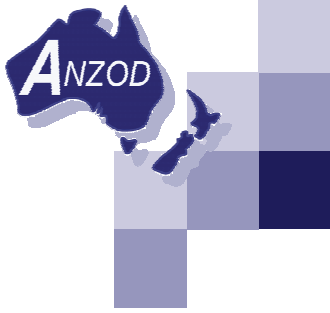
Figure 3.4

Time from Ventilation to Brain Death
Australia 2010-2014



For DCD donors, ventilation to circulatory death is analysed.

Donors in Australia and New Zealand with no ventilation date reported are excluded from the analysis.



Organ Donation Pathway

Time From Brain Death to Donation

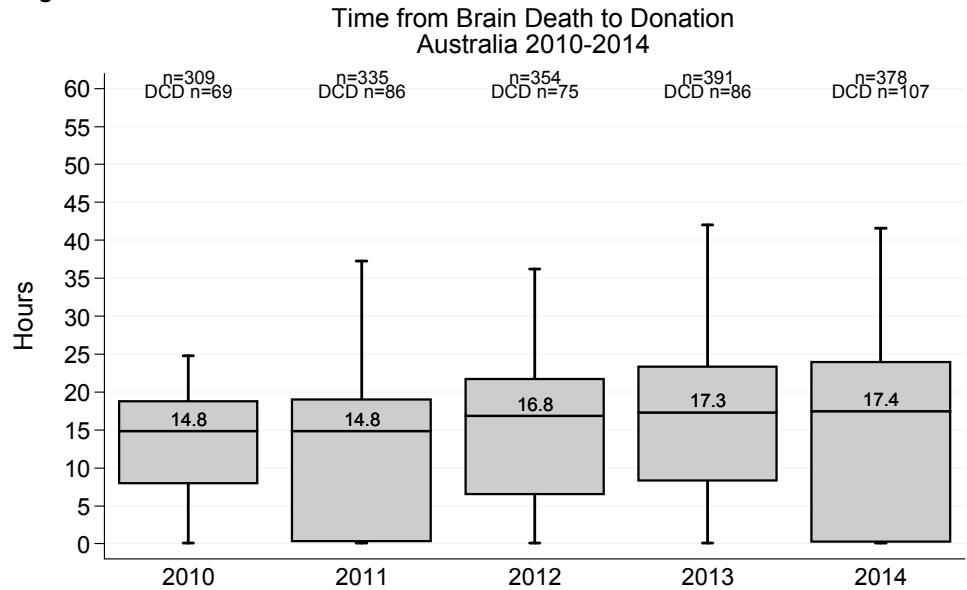
Figure 3.5

AUSTRALIA

In 2014, 27 DBD donors (10%) underwent aortic cross clamp within twelve hours of the certification of brain death.

The median time was 21 hours.

Cross clamp did not proceed in one Australian donor



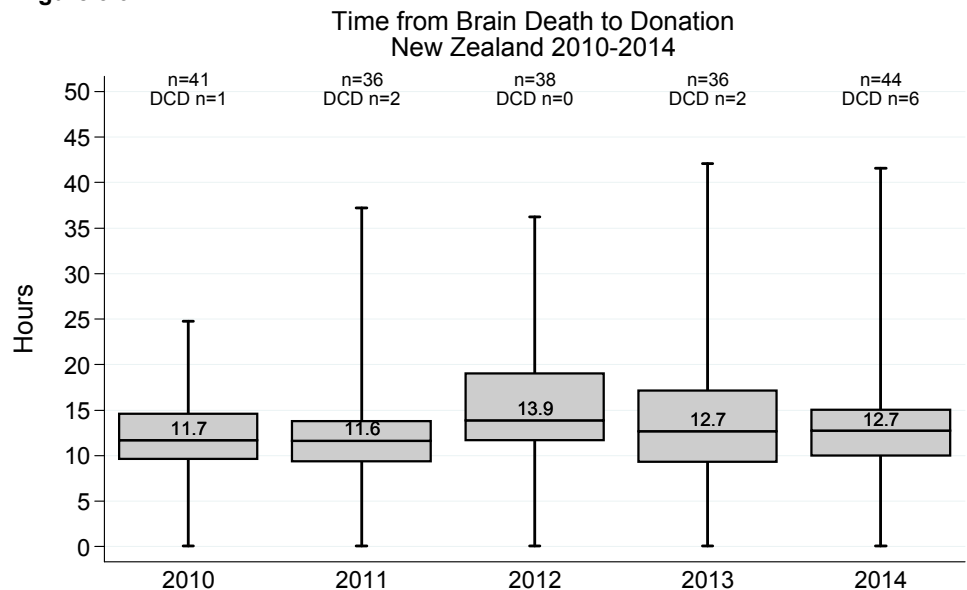
NEW ZEALAND

In 2013, 19 DBD (48%) underwent aortic cross clamp within twelve hours of the certification of brain death.

The median time was 12.9 hours.

Cross clamp of the donor did not proceed in three New Zealand donors.

Figure 3.6



* For DCD donors, the time from circulatory death to time of cold perfusion and for DBD donors, the time from brain death to time of cross clamp, is used for the analysis.



Donor Maintenance

Maintenance medication of the donor (Given in the intensive care/critical care unit)

Australia

There were 66 donors (17%) who did not require maintenance drug support in 2014.

Antidiuretic agents (desmopressin/vasopressin) were prescribed to 51% (192) of all donors.

MAP <50 mm Hg

Mean arterial blood pressure (MAP) <50 mmHg was recorded in 1.6% (6) of donors in Australia in 2014. Three donors had a duration of less than one hour and no donors had one hour or longer. One donor had no reported duration of MAP <50mmHg. The range was 15 minutes to 30 mins.

New Zealand

In 2014 there were three donors who did not require inotropic support.

Antidiuretic agents were prescribed to 52.2% (24) of all donors.

MAP <50 mmHg

One donor was reported with a mean arterial blood pressure (MAP) <50 mmHg with a duration of one hour.

Terminal Treatment

(medication provided in the operating theatre)

Australia

There were 78 donors who did not receive any heparin as part of their terminal treatment in 2014. Seventy three of those donors were DCD (donation after circulatory death).

Seventy two donors did not receive any terminal treatment; 71 of those were DCD.

New Zealand

There were two donors who did not receive any heparin and only One donor did not receive any drugs as part of terminal treatment in 2014. This was a heart beating donor.



Organ Donation Pathway

Summary - Organs Requested, Consent Given, Retrieved and Transplanted

Table 3.14 shows the outcome of organs requested in 2014(2103). The information on request for organ donation, refers only to those patients who become actual donors. The reasons for organs not requested, not retrieved or not transplanted are documented for all of the specific organs in Chapter 5 - Organ Data. For further details see Supplement 1 - for Australia and Supplement 2 - for New Zealand. Figure 3.16 shows the outcome of organs requested in 2014 (2013).

Table 3.14

Summary for Organ Donation Pathway by Organ Type 2014 (2013)							
	Kidneys	Liver	Heart	Lungs	Pancreas	Intestine	
Australia	Organs for donation	756 (782)	378 (391)	378 (391)	756 (782)	378 (391)	376 (391)
	Organs Requested	742 (760)	355 (360)	279 (270)	684 (690)	302 (299)	171 (57)
	Organs Consented	740 (758)	347 (358)	250 (257)	660 (660)	285 (290)	132 (48)
	Organs Retrieved	700 (691)	241 (243)	91 (92)	166 (170)	101 (68)	1 (0)
	Utilised organs for transplantation	659 (645)	222 (233)	83 (79)	315 (331)	44 (33)	1 (0)
	Recipients transplanted	* 637 (630)	* 237 (252)	* 83 (79)	* 163 (169)	44 (33)	1 (0)
New Zealand	Organs for donation	92 (72)	46 (36)	46 (36)	92 (72)	46 (35)	46 (36)
	Organs Requested	88 (68)	41 (35)	29 (20)	66 (54)	22 (12)	0 (0)
	Organs Consented	88 (68)	41 (35)	27 (19)	66 (54)	22 (12)	0 (0)
	Organs Retrieved	74 (61)	33 (25)	17 (9)	20 (18)	2 (0)	0 (0)
	Utilised organs for transplantation	67 (58)	32 (24)	17 (9)	39 (36)	2 (0)	0 (0)
	Recipients transplanted	* 66 (55)	* 35 (26)	* 17 (9)	* 20 (18)	2 (0)	0 (0)
<p><i>Kidneys and Lungs are counted as two separate organs (i.e. left and right)</i></p> <p><i>*For Australia, 2014(2013) includes 22(15) Double adult/Enbloc Kidneys, 30(45) Partial Livers, 4(2) Heart-Lungs, 7(5) Single Lung and 152(162) Double Lungs transplants</i></p> <p><i>*For New Zealand, 2014(2013) includes 1(3) Double-adult/Enbloc Kidneys, 6(5) Partial Livers, 0(0) Heart-Lungs, 1(0) Single Lung transplants and 19(18) Double Lungs transplants</i></p> <p><i>There are 10 (1) Pancreas Islets transplants in Australia and 0 (0) in New Zealand</i></p>							

The reason organs were not used are identified in Chapter 5 - Organ Data and in Supplement 1 for Australia and Supplement 2 for New Zealand.

Organs retrieved and used for research were not intended for transplantation in the first instance.

Organ Donation Pathway

Multiple Organ Retrieval



There were 86 (23%) Australian donors in 2014 who had a single organ retrieved and transplanted, shown in Table . Kidney only donation occurred in 71 cases.

New Zealand had 12 (26%) single organ donors in 2014, seven donating kidneys, four donating a liver and one donating a heart.

In Australia, 75% (284) of donors and 67% (31) of donors in New Zealand had two or more organs retrieved for the purpose of transplantation.

Table 3.15

Multiple Organ Retrieval 2010 - 2014										
Number of Organs	Australia					New Zealand				
	2010	2011	2012	2013	2014	2010	2011	2012	2013	2014
No organs	7 (2%)	8 (2%)	12 (3%)	16 (4%)	8 (2%)	3 (7%)	3 (8%)	4 (11%)	0 (0%)	3 (7%)
One	60 (19%)	89 (26%)	87 (25%)	86 (22%)	86 (23%)	9 (22%)	4 (11%)	5 (13%)	9 (25%)	12 (26%)
Two	98 (32%)	97 (29%)	107 (30%)	120 (31%)	106 (28%)	12 (29%)	10 (26%)	12 (32%)	13 (36%)	8 (17%)
Three	61 (20%)	75 (22%)	76 (21%)	100 (26%)	92 (24%)	12 (29%)	16 (42%)	8 (21%)	8 (22%)	12 (26%)
Four	54 (17%)	45 (13%)	50 (14%)	50 (13%)	51 (13%)	5 (12%)	5 (13%)	9 (24%)	6 (17%)	10 (22%)
Five	29 (9%)	23 (7%)	22 (6%)	19 (5%)	35 (9%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	1 (2%)



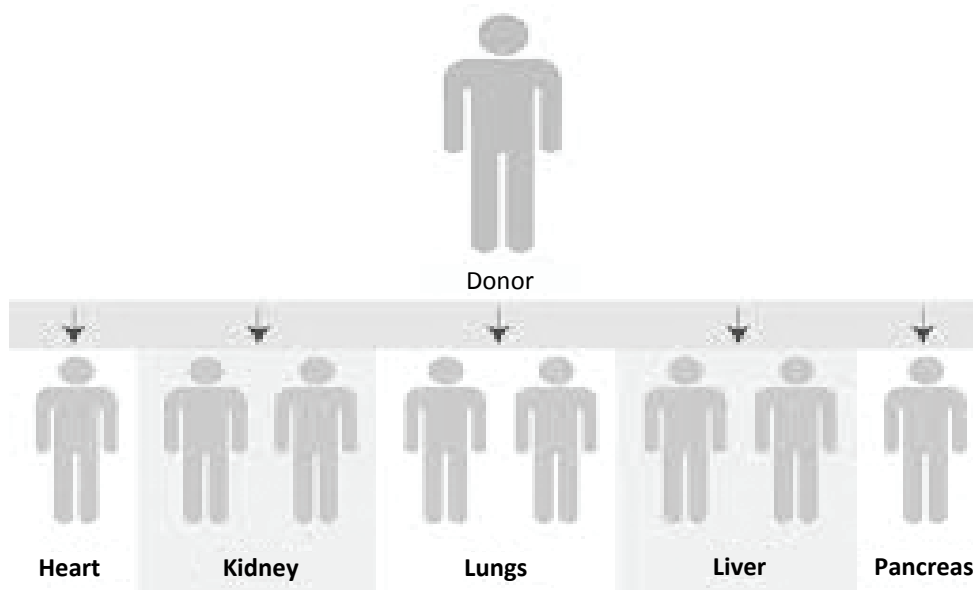
Organ Donation Pathway

Table 3.16 shows the comparison of multiple organ retrieval by State and Country for 2014

Table 3.16

Comparison of Multiple Organ Retrieval by State/Country 2014										
Number Of Organs	QLD	NSW	ACT	VIC	TAS	SA	NT	WA	AUST	NZ
No organs	0 (0%)	2 (2%)	0 (0%)	4 (3%)	0 (0%)	2 (6%)	0 (0%)	0 (0%)	8 (2%)	3 (7%)
One	17 (24%)	28 (30%)	3 (27%)	25 (21%)	1 (11%)	2 (6%)	2 (29%)	8 (23%)	86 (23%)	12 (26%)
Two	20 (28%)	29 (32%)	3 (27%)	27 (23%)	3 (33%)	11 (31%)	1 (14%)	12 (34%)	106 (28%)	8 (17%)
Three	21 (30%)	18 (20%)	1 (9%)	29 (25%)	2 (22%)	8 (22%)	3 (43%)	10 (29%)	92 (24%)	12 (26%)
Four	10 (14%)	8 (9%)	1 (9%)	18 (15%)	2 (22%)	9 (25%)	1 (14%)	2 (6%)	51 (13%)	10 (22%)
Five	3 (4%)	7 (8%)	3 (27%)	14 (12%)	1 (11%)	4 (11%)	0 (0%)	3 (9%)	35 (9%)	1 (2%)

For the above donor counts, 2 kidneys=1 organ, 2 lungs=1 organ
On occasions when only one kidney or lung is retrieved, this is also defined as one organ



One donor can benefit the lives of a number of recipients suffering end stage organ disease.