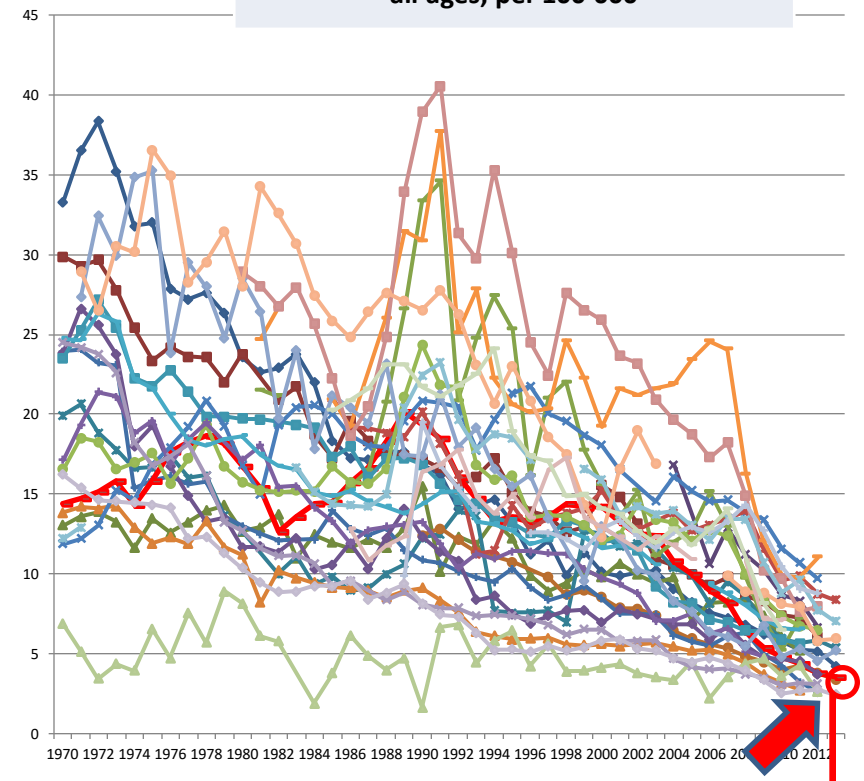
THE CHANGING SCENARIO FOR ORGAN DONATION

Elisabeth Coll Torres MD PhD

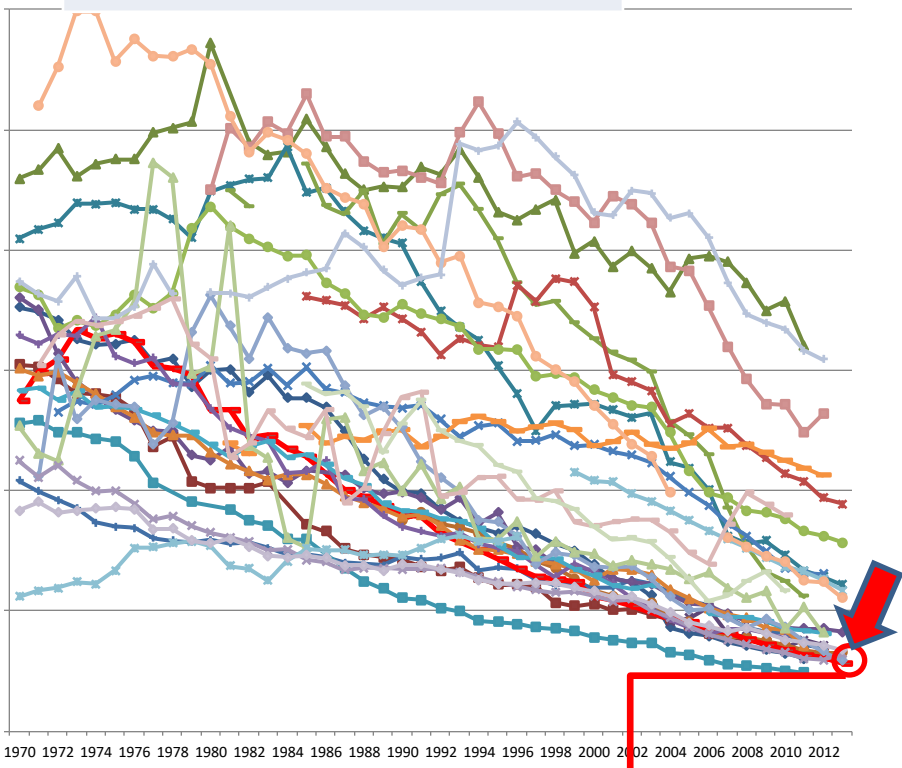
Organización Nacional de Trasplantes, Spain

DECREASE OF RELEVANT MORTALITY FOR THE DONATION OF ORGANS IN MOST COUNTRIES OF THE EUROPEAN UNION

SDR, motor vehicle traffic accidents, all ages, per 100 000

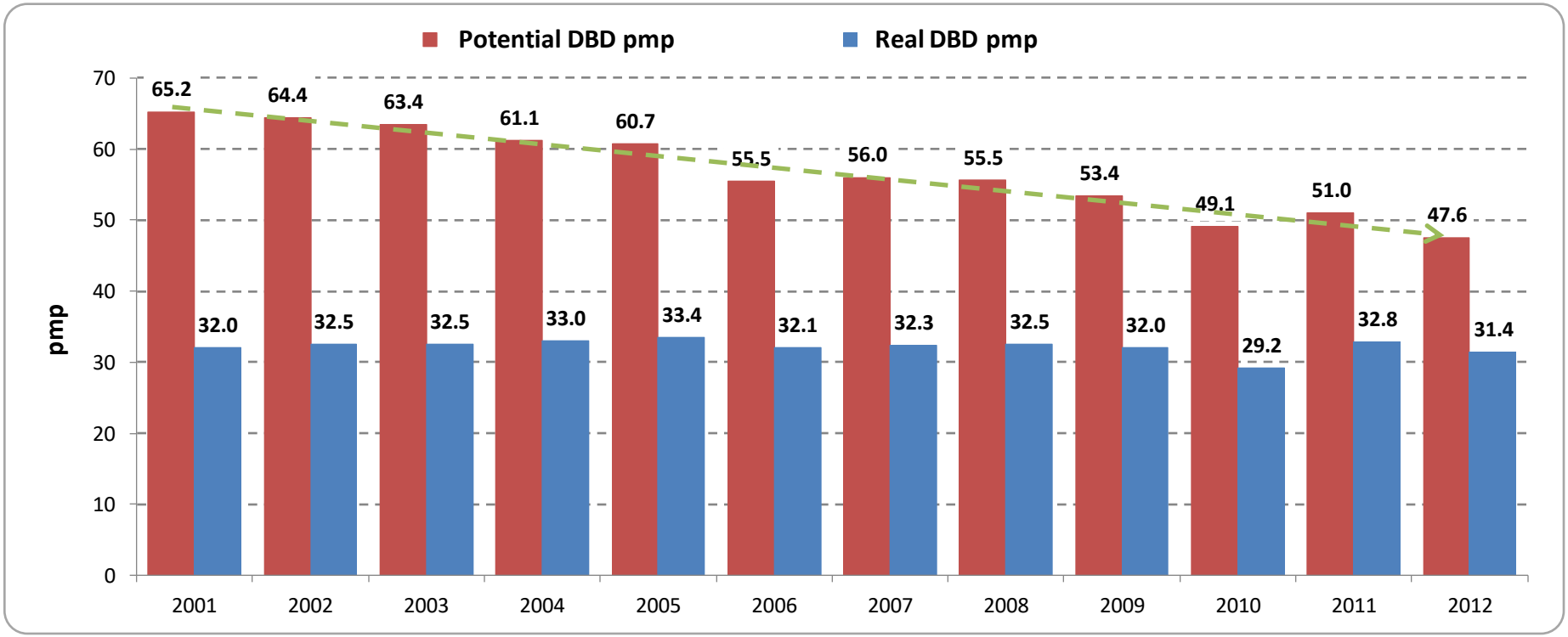


SDR, cerebrovascular diseases, all ages, per 100 000



…and Spain is here

Decrease in Potential for Brain Death Donation in Spain



De la Rosa et al. Am J Transplant 2012; 12:2507

Treatment recommendations at the end-of-life of the critical patient

RECOMENDACIONES GRUPOS DE TRABAJO DE LA SEMICYUC

Recomendaciones de tratamiento al final de la vida del paciente crítico

Treatment recommendations at the end of the life of the critical patient

J.L. Monzón Marín[a]; I. Saralegui Reta[b]; R. Abizanda i Campos[c]; L. Cabré Pericas[d]; S. Iribarren Diarasarri[e]; M.C. Martín Delgado[f]; K. Martínez Urionabarrenetxea[g] y Grupo de Bioética de la SEMICYUC*

[a]Unidad de Cuidados Intensivos. Complejo Hospitalario San Millán-San Pedro. Logroño. España.

[b]Unidad de Medicina Intensiva. Hospital Santiago Apóstol. Vitoria-Gasteiz. Espa

A. Manzano, S. Ortega, M.T. Saldaña,

ETHICUS STUDY
ICU DEATHS
18% WSLT

Sprung et al, 2003; JAMA 290.

EPIPUSE STUDY
ICU DEATHS
34% WSLT

Hernandez-Tejedor et al, 2015; Med Intensiva:395

'(…) The second concept is based on the principle of non-maleficience and justice. The treating physician is not obliged to perform or continue with futile treatments, these being those which do not achieve their expected objective.

In this sense, continuing futile treatments is considered a bad clinical practice since it is not respectful with human dignity; on the other hand, the unnecessary use of health care resources is against the priciple of distributive justice'.

Monzón JL, et al. Med Intensiva 2008;32(3):121-33.

EXPANSION DONOR POOL
40 pmp DONOR PLAN

ELSEVIER

The 40 Donors Per Million Population Plan: An Action Plan for Improvement of Organ Donation and Transplantation in Spain

R. Matesanz, R. Marazuela, B. Domínguez-Gil, E. Coll, B. Mahillo, and G. de la Rosa

ABSTRACT

Introduction. Spain has been showing the highest rate of deceased donor organ recovery in the world for a whole country, namely, 33–35 donors per million population (pmp) during the last years. This activity is attributed to the so-called Spanish Model of organ donation, an integrated approach to improve organ donation since the start of the Organización Nacional de Trasplantes (ONT) in 1989. However, in 2007 there were 7/17 egional variability. Thus, ONT has set a substantial improvement in donation and e 40 Donors pmp Plan.

to increase the average rate of deceased reas of improvement, specific objectives, he data and the material generated from on with the donation and transplantation

management of brain-dead donors, with its, new forms of hospital management, l/maintenance of thoracic organ donors. donors with positive tests to certain viral cial surgical techniques. Donation after

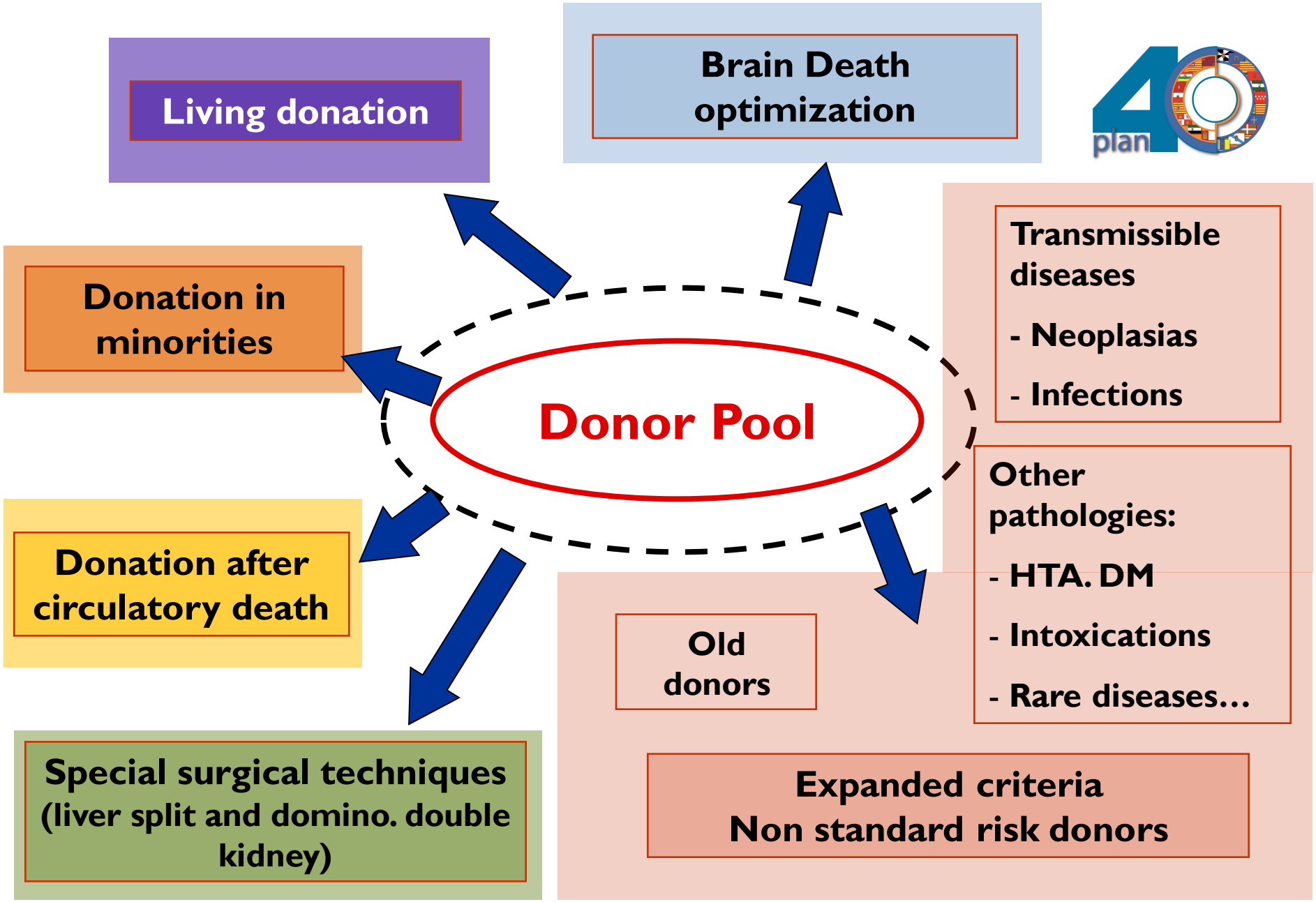
r years. The Spanish success with regard to donation and ansplantation has been nationally and internationally at- buted to a unique organizational model, the so-called anish Model for Organ Donation and Transplantation, in short, the 'Spanish Model.' Since the creation of the rganizacion Nacional de Trasplantes (ONT) in 1989[2] and e simultaneous development of a coordination network of ghly motivated in-hospital medical doctors in charge of e donation process[2,3] organ donation and transplantation tivities have strikingly increased in Spain.[4,5] With regard donation in particular, the rates have moved from 14.3 nors pmp in 1989 to 33–35 donors pmp in recent years[6] ig 2). The Spanish Model has been successfully imple-

From the Organización Nacional de Trasplantes, Madrid, ain.

OBJECTIVE: Donor rate 40 pmp

- DBD Optimization
- DCD
- Living Donation
- Expanded criteria/ NSR donors
- Donation in minorities
- Special Surgical Techniques

Matesanz R, et al. Transplantation proceedings, 2009


Living donation
Brain Death optimization
plan 40
Donation in minorities
Transmissible diseases
- Neoplasias
- Infections
Donor Pool
Donation after circulatory death
Other pathologies:
- HTA. DM
- Intoxications
- Rare diseases…
Old donors
Special surgical techniques (liver split and domino. double kidney)
Expanded criteria
Non standard risk donors

Benchmarking project in the donation after brain death

QUANTITATIVE PHASE

INDICATORS

1. REFERRAL OF POTENTIAL DONORS TO CU
2. MANAGEMENT OF POTENTIAL DONORS INSIDE CU
3. OBTAINING CONSENT TO ORGAN DONATION

WHO IS THE BEST?

IDENTIFICATION OF BEST PERFORMER HOSPITALS (BPH)

QUALITATIVE PHASE

VISIT TO BPH

- STRUCTURED INTERVIEW
- TRANSPLANT COORDINATORS
- OPENED QUESTIONS

HOW DO THEY DO IT?

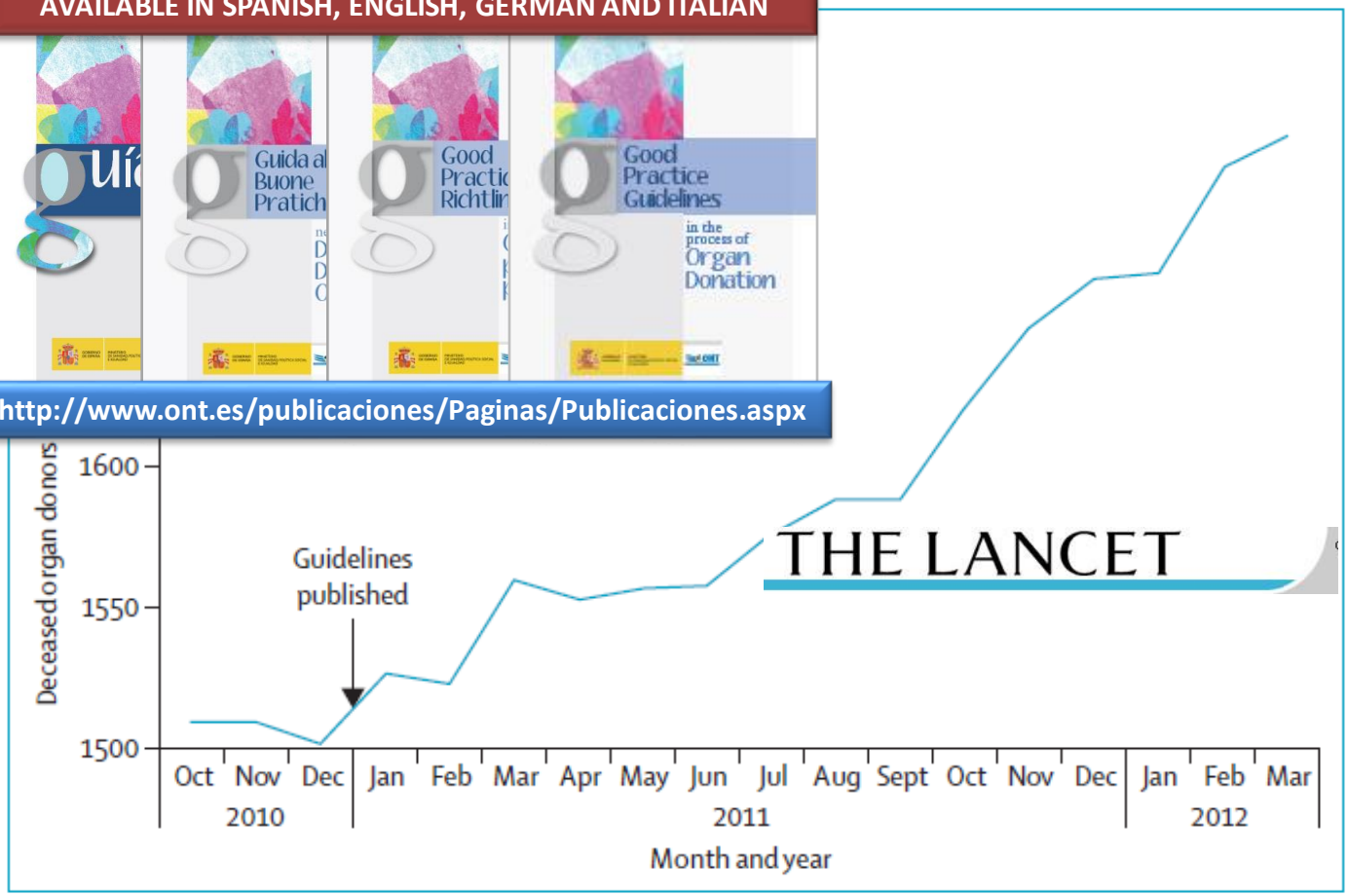
IDENTIFICATION AND DESCRIPTION OF BEST PRACTICES

Matesanz R, et al. Am J Transplant 2012;12(9):2498-506

Monthly evolution of the interannual number of deceased organ donors in Spain

GOOD PRACTICES GUIDELINE
AVAILABLE IN SPANISH, ENGLISH, GERMAN AND ITALIAN

http://www.ont.es/publicaciones/Paginas/Publicaciones.aspx



Number of donors within the 12 previous months at a given date

Matesanz R et al. Lancet 2012

Involvement Emergencies health professionals in donation process

DIARIO MEDICO

Acuerdo de la ONT y Semes en formación e investigación

J. M. J.

La Organización Nacional de Trasplantes (ONT) y la Sociedad Española de Medicina de Urgencias y Emergencias (Semes) firmaron ayer un convenio que amplía la colaboración docente que mantienen desde hace tres años a otros campos como la investigación.

El nuevo acuerdo, que extenderá la formación de profesionales de urgencias en donación y trasplante de órganos a todo el Sistema Nacional de Salud, se ha rubricado por una duración inicial de cuatro años, durante los cuales la ONT y Semes calculan que pueden formar al menos a 2.000 profesionales.

Andalucía, Castilla y León, Cataluña, Galicia, Extremadura, Madrid y el País Vasco impartirán en los próxima que la ONT destacó en su guía de buenas prácticas (ver DM del 5-I, del 25-II y del 5-VII-2011).

Rafael Matesanz, director de la ONT, ha manifestado su satisfacción por el acuerdo alcanzado por significar un paso más hacia la implicación de todos los profesionales en el proceso de la donación y hacia la aplicación de la guía una vez comprobado que los resultados obtenidos en los hospitales en los que existe la figura del coordinador de trasplantes en los servicios de urgencias son mejores. Además, el acuerdo "permitirá precisar la medi
en los
potenc
donaci
ca, algo
conocer
Tamb

TRAINING PROGRAMMES ONT–SEMES

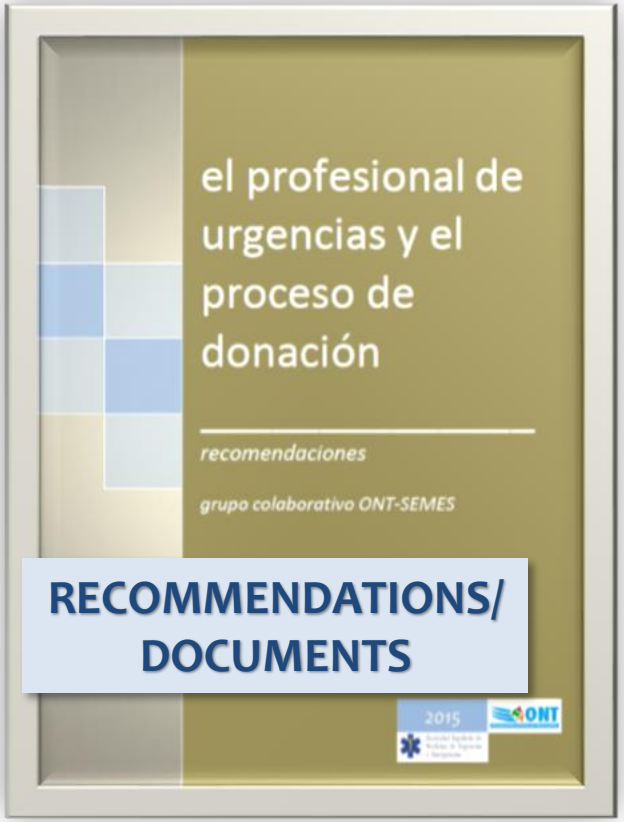
215 COURSES ALL AROUND SPAIN:
>7000 emergency professionals trained during the last eight years

ANÁLISIS DEL POTENCIAL DE DONACIÓN EN LOS SERVICIOS DE URGENCIAS HOSPITALARIAS

PROYECTO COLABORATIVO ONT_SEMES

ONT · Sociedad Española de Medicina de Urgencias y Emergencias

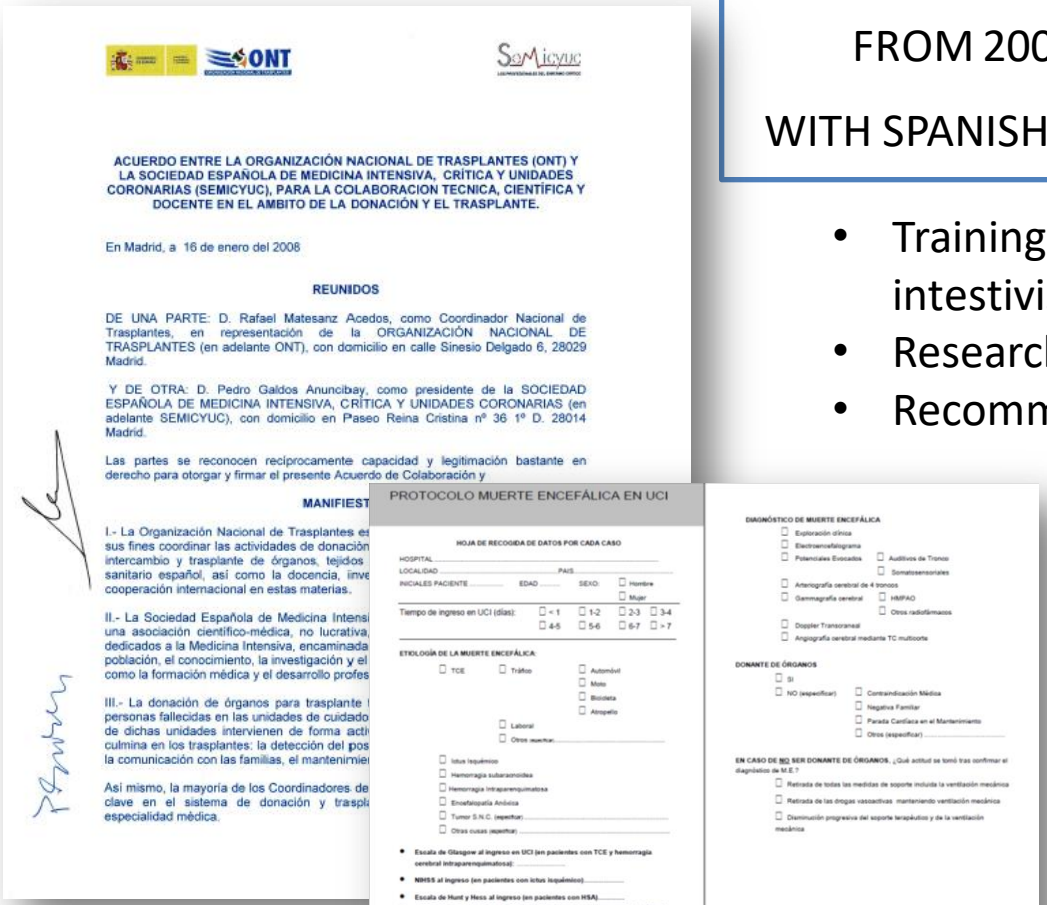
COMMON RESEARCH PROJECTS



RECOMMENDATIONS/ DOCUMENTS

Available at http://www.ont.es

Involvement of Intensive Care Professionals in donation process



ACUERDO ENTRE LA ORGANIZACIÓN NACIONAL DE TRASPLANTES (ONT) Y LA SOCIEDAD ESPAÑOLA DE MEDICINA INTENSIVA, CRÍTICA Y UNIDADES CORONARIAS (SEMICYUC), PARA LA COLABORACION TECNICA, CIENTÍFICA Y DOCENTE EN EL AMBITO DE LA DONACIÓN Y EL TRASPLANTE.

En Madrid, a 16 de enero del 2008

REUNIDOS

DE UNA PARTE: D. Rafael Matesanz Acedos, como Coordinador Nacional de Trasplantes, en representación de la ORGANIZACIÓN NACIONAL DE TRASPLANTES (en adelante ONT), con domicilio en calle Sinesio Delgado 6, 28029 Madrid.

Y DE OTRA: D. Pedro Galdos Anuncibay, como presidente de la SOCIEDAD ESPAÑOLA DE MEDICINA INTENSIVA, CRÍTICA Y UNIDADES CORONARIAS (en adelante SEMICYUC), con domicilio en Paseo Reina Cristina nº 36 1º D. 28014 Madrid.

Las partes se reconocen recíprocamente capacidad y legitimación bastante en derecho para otorgar y firmar el presente Acuerdo de Colaboración y

MANIFIEST

I.- La Organización Nacional de Trasplantes es
sus fines coordinar las actividades de donación
intercambio y trasplante de órganos, tejidos
sanitario español, así como la docencia, inve
cooperación internacional en estas materias.

II.- La Sociedad Española de Medicina Intensi
una asociación científico-médica, no lucrativa,
dedicados a la Medicina Intensiva, encaminada
población, el conocimiento, la investigación y el
como la formación médica y el desarrollo profes

III.- La donación de órganos para trasplante
personas fallecidas en las unidades de cuidado
de dichas unidades intervienen de forma acti
culmina en los trasplantes: la detección del pos
la comunicación con las familias, el mantenimie

Así mismo, la mayoría de los Coordinadores de
clave en el sistema de donación y trasp
especialidad médica.

PROTOCOLO MUERTE ENCEFÁLICA EN UCI

HOJA DE RECOGIDA DE DATOS POR CADA CASO

HOSPITAL
LOCALIDAD PAIS
INICIALES PACIENTE EDAD SEXO: Hombre Mujer

Tiempo de ingreso en UCI (días): <1 1-2 2-3 3-4 4-5 5-6 6-7 >7

ETIOLOGÍA DE LA MUERTE ENCEFÁLICA:
TCE Tráfico Automóvil Moto Bicicleta Atropello Laboral Otros (especificar)
Ictus isquémico
Hemorragia subaracnoidea
Hemorragia intraparenquimatosa
Encefalopatía Anóxica
Tumor S.N.C. (especificar)
Otras causas (especificar)

- Escala de Glasgow al ingreso en UCI (en pacientes con TCE y hemorragia cerebral intraparenquimatosa):
- NIHSS al ingreso (en pacientes con ictus isquémico)
- Escala de Hunt y Hess al ingreso (en pacientes con HSA)

Durante su ingreso estuvo en algún momento a tratamiento con coma barbitúrico? Sí No

DIAGNÓSTICO DE MUERTE ENCEFÁLICA
Exploración clínica
Electroencefalograma
Potenciales Evocados Auditivos de Tronco Somatosensoriales
Arteriografía cerebral de 4 troncos
Gammagrafía cerebral HMPAO Otros radiofármacos
Doppler Transcraneal
Angiografía cerebral mediante TC multicorte

DONANTE DE ÓRGANOS
SI
NO (especificar) Contraindicación Médica Negativa Familiar Parada Cardíaca en el Mantenimiento Otros (especificar)

EN CASO DE NO SER DONANTE DE ÓRGANOS, ¿Qué actitud se tomó tras confirmar el diagnóstico de M.E.?
Retirada de todas las medidas de soporte incluida la ventilación mecánica
Retirada de las drogas vasoactivas manteniendo ventilación mecánica
Disminución progresiva del soporte terapéutico y de la ventilación mecánica

SEMICYUC · ONT

CUIDADOS INTENSIVOS ORIENTADOS A LA DONACIÓN DE ÓRGANOS

RECOMENDACIONES SEMICYUC-ONT PARA PROFESIONALES DE MEDICINA INTENSIVA

FROM 2008, COLLABORATION AGREEMENT

WITH SPANISH INTENSIVE CARE SOCIETY (SEMICYUC)

- Training Programme (+ 1000 young intestivists trained)
- Research projects
- Recommendations

Escudero D, et al. Intensive care practices in brain death diagnosis and organ donation. Anaesthesia. 2015 Oct;70(10):1130-9

Involvement of Intensive Care Professionals in donation process - Quality Indicators SEMICYUC

INDICATOR	SD
ORGAN DONATION	
$\frac{\text{Nº Donors}}{\text{Nº BD people in CU}} \times 100$	60%
$\frac{\text{Nº people in BD correctly monitored}}{\text{Nº BD people in CU}} \times 100$	100%
$\frac{\text{Nº confirmed BD}}{\text{Nº CU Deaths}} \times 100$	5-30%

http://www.semicyuc.org/sites/default/files/actualizacion_indicadores_calidad_2011.pdf

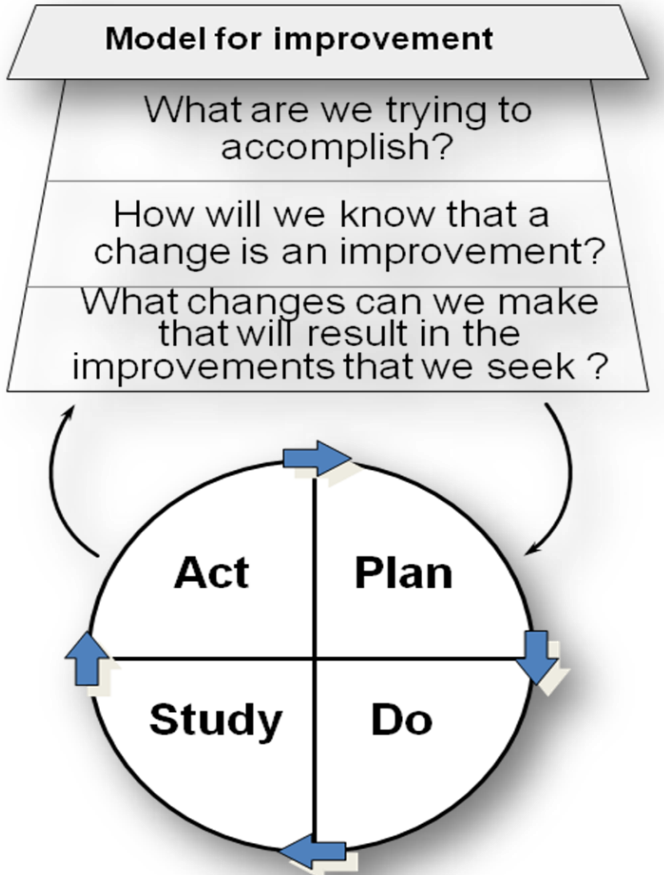
GOBIERNO DE ESPAÑA | MINISTERIO DE SANIDAD, SERVICIOS SOCIALES E IGUALDAD | ONT

2016

ACCORD Spain - small interventions in deceased donation through PDSA cycles in 40 donor hospitals

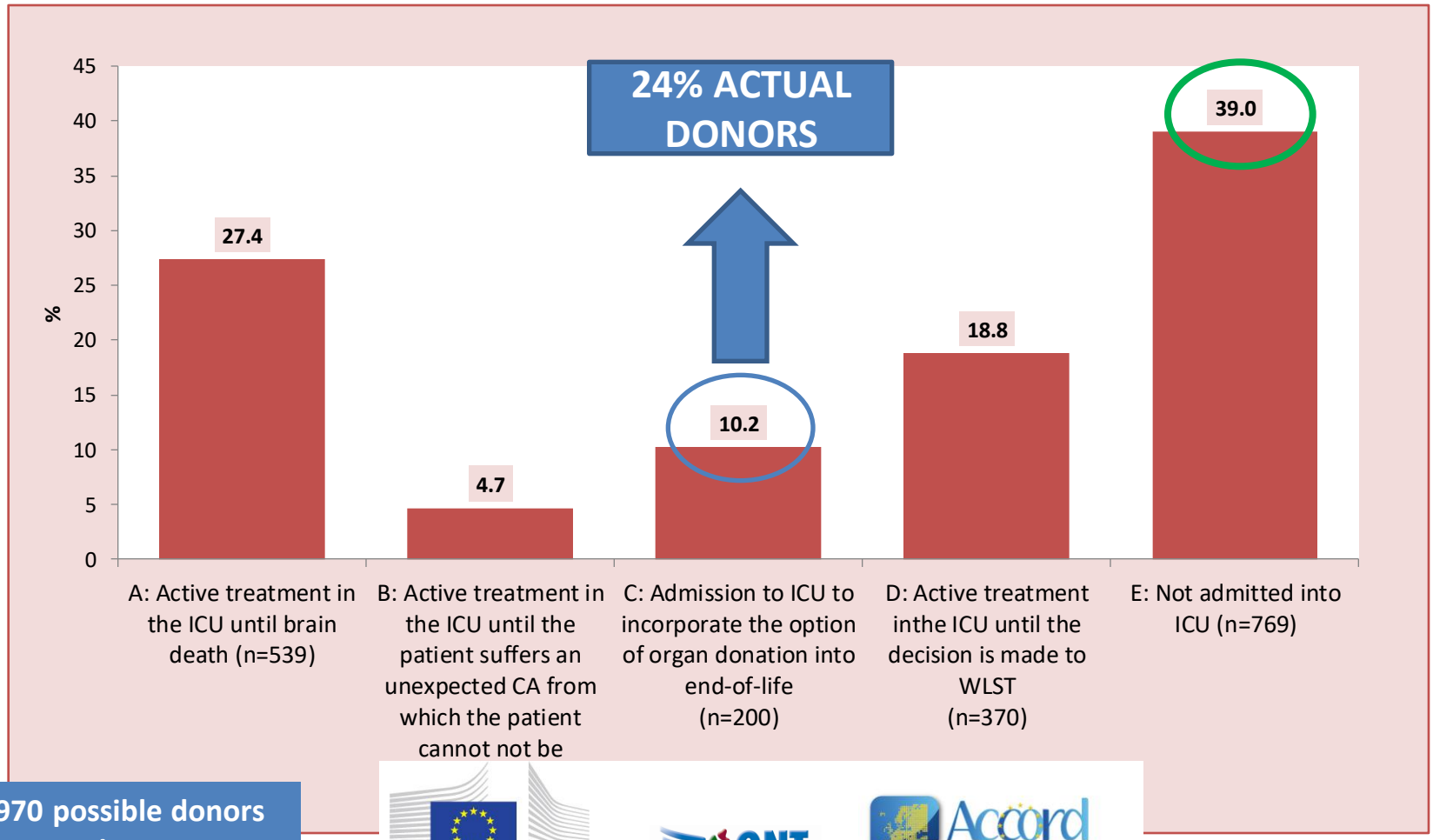
EMERGENCY CARE
NEUROLOGY/NEUROSURGERY
INTERNAL MEDICINE
INTENSIVE CARE

- Proactive follow-up system for patients with catastrophic brain injuries – ICD-10 codified mortality, neuroimages, etc. – discusion with treating physicians.
- Notification criteria with supporting material
- New systems of notification
- Protocols on Elective Non Therapeutic Intensive Care to facilitate organ donation
- Daily review of deaths
- Training sessions and feed-back activities



European Commission | ONT | Accord

1 out of 4 actual donors in Spain have been admitted to the ICU to enable organ donation



N=1970 possible donors aged ≤85 11/1/2014-4/30/2015

Domínguez-Gil B, et al. Med. Intensiva 2016

Domínguez-Gil B, et al. Transplantation 2017

Possible organ donors not admitted into the ICU

Patients dead as a result of a devastating brain injury (possible donors) ≤ 85 years
68 hospitals
1st November 2014 – 30th April 2015

1970 Possible donors

769 Not admitted into the ICU (39%)

Mean age
78 years

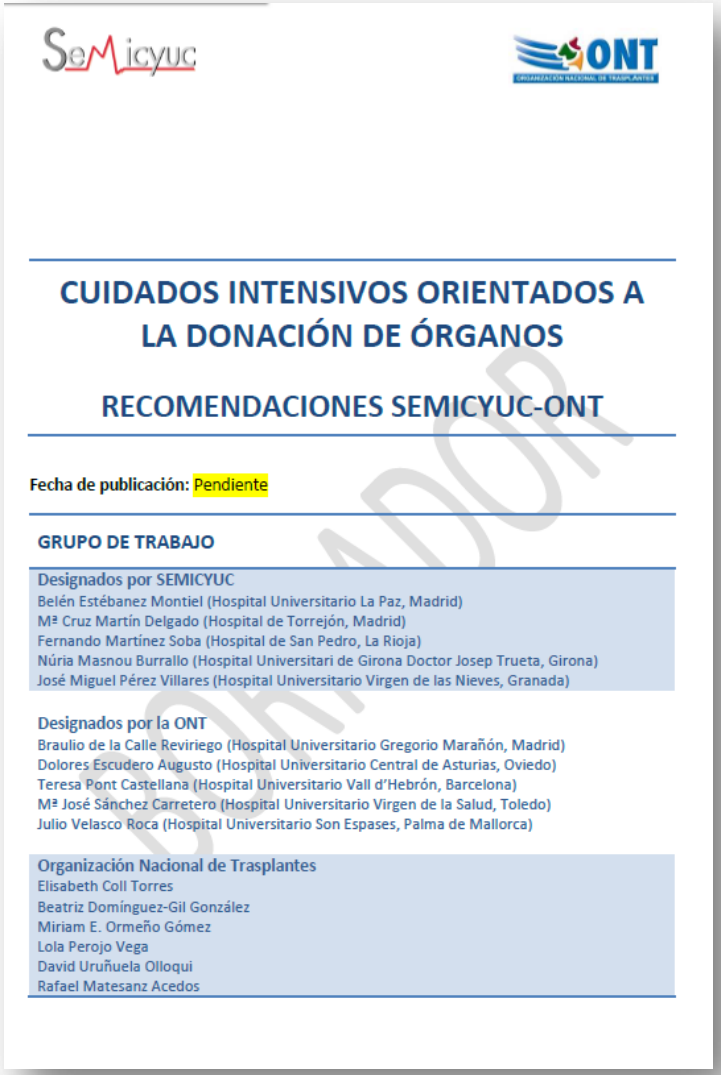
427 No medical contraindications (56%)

342 NEVER REFERRED TO THE DONOR COORDINATOR

49 Intubated– 39 dead ≤ 3 days
378 Not intubated– 226 dead ≤ 3 days

Domínguez-Gil B, et al. Med Intensiva 2016

Intensive Care to facilitate Organ Donation - ICOD



SEMICYUC ONT

CUIDADOS INTENSIVOS ORIENTADOS A LA DONACIÓN DE ÓRGANOS

RECOMENDACIONES SEMICYUC-ONT

Fecha de publicación: Pendiente

GRUPO DE TRABAJO

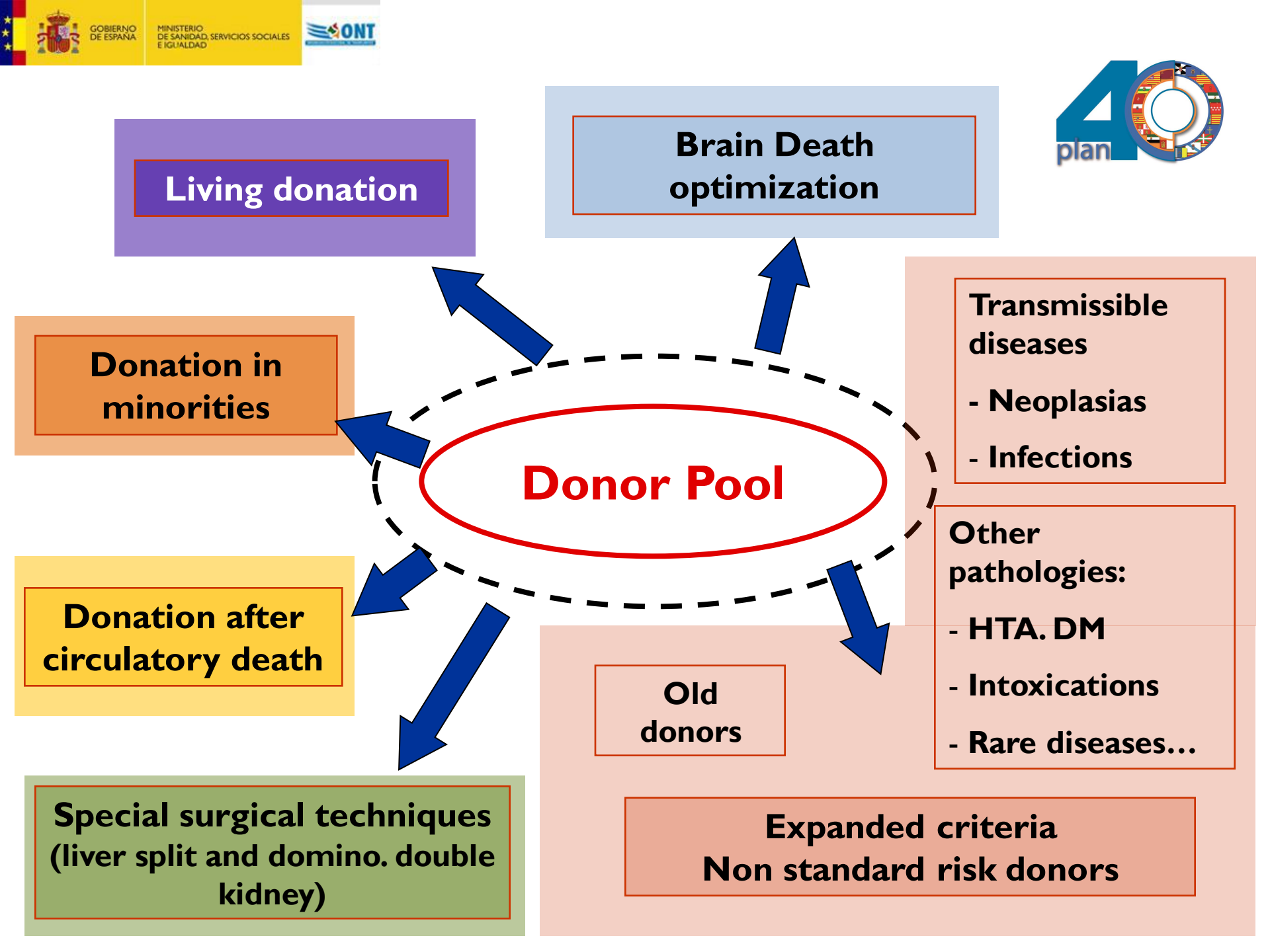
Designados por SEMICYUC
Belén Estébanez Montiel (Hospital Universitario La Paz, Madrid)
Mª Cruz Martín Delgado (Hospital de Torrejón, Madrid)
Fernando Martínez Soba (Hospital de San Pedro, La Rioja)
Núria Masnou Burrallo (Hospital Universitari de Girona Doctor Josep Trueta, Girona)
José Miguel Pérez Villares (Hospital Universitario Virgen de las Nieves, Granada)

Designados por la ONT
Braulio de la Calle Reviriego (Hospital Universitario Gregorio Marañón, Madrid)
Dolores Escudero Augusto (Hospital Universitario Central de Asturias, Oviedo)
Teresa Pont Castellana (Hospital Universitario Vall d'Hebrón, Barcelona)
Mª José Sánchez Carretero (Hospital Universitario Virgen de la Salud, Toledo)
Julio Velasco Roca (Hospital Universitario Son Espases, Palma de Mallorca)

Organización Nacional de Trasplantes
Elisabeth Coll Torres
Beatriz Domínguez-Gil González
Miriam E. Ormeño Gómez
Lola Perojo Vega
David Uruñuela Olloqui
Rafael Matesanz Acedos

- ✓ Legal, deontological and ethical framework
- ✓ Identification of possible donors
- ✓ Research of the will of donation. Care and communication with the family of the possible donor
- ✓ Critical Unit management
- ✓ Recommendation to implement a ICOD program
- ✓ Outcomes evaluation

EXTERNAL REVIEW PHASE


Living donation
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- Rare diseases…
Donation after circulatory death
Old donors
Special surgical techniques (liver split and domino. double kidney)
Expanded criteria
Non standard risk donors

Spanish program to promote DCD

AIMS

1. **Creation of new DCD programs – uDCD & cDCD**
2. **Increase the effectiveness of DCD - utilization rate and number of organs recovered & transplanted per donor**
3. **Evaluate post-transplant outcomes with organs from DCD-strategies for improvement**

start!

plan 40
Para el impulso de la Donación y el Trasplante
ORGANIZACIÓN NACIONAL DE TRASPLANTES

1. **Introduction**
2. **Glossary & classification of DCD**
3. **Determination of death by circulatory criteria**
4. **Uncontrolled DCD**
   a. Out-of-hospital logistics. Donor selection criteria
   b. In-hospital logistics. Donor selection criteria
   c. Preservation. recovery and organ viability
   d. Family approach
5. **Controlled DCD**
   a. Donor selection criteria
   b. WLST
   c. Family approach
   d. Extubation. cardiac arrest and death determination
   e. Preservation. recovery and organ viability
   f. Requisites for starting a controlled DCD program
6. **Recipient selection criteria & peritransplant management. Information to the potential recipient**
7. **Communication with the media**
8. **Ethical & legal aspects**

DCD in Spain: state of the art and recommendations

National Consensus Document 2012

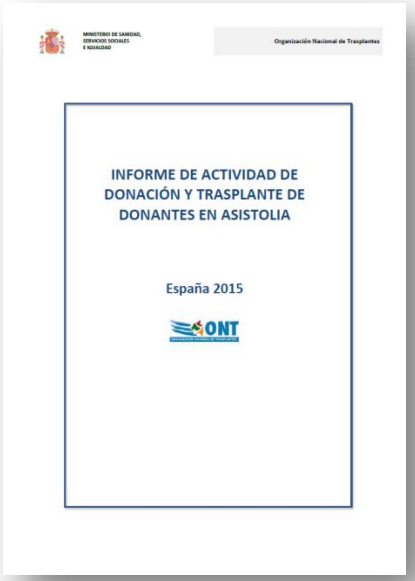
Additional measures

- **Training courses**

  Controlled and uncontrolled DCD

  New scenarios for family interview

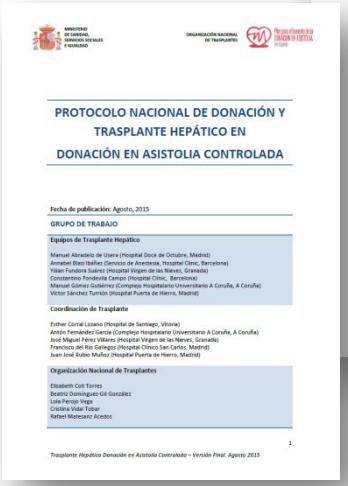
  Normothermic Abdominal Perfusion

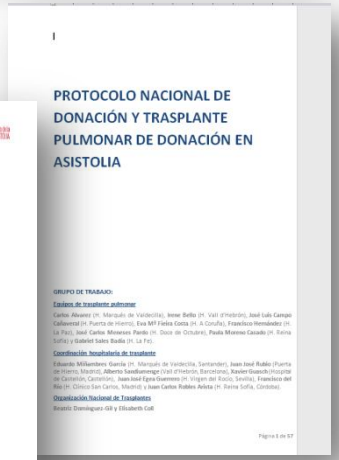


- **Annual Report DCD activity in Spain**

  Description of procedures and trends

  Outcomes: organ recovery, transplantation and post transplant results



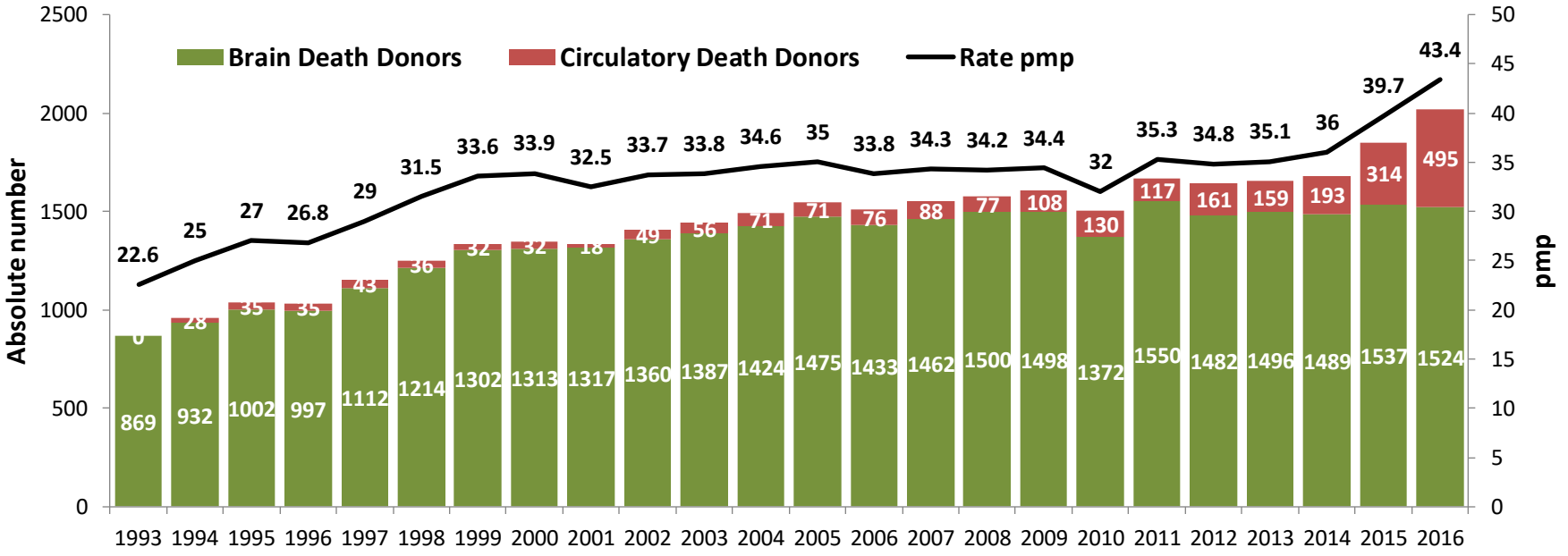


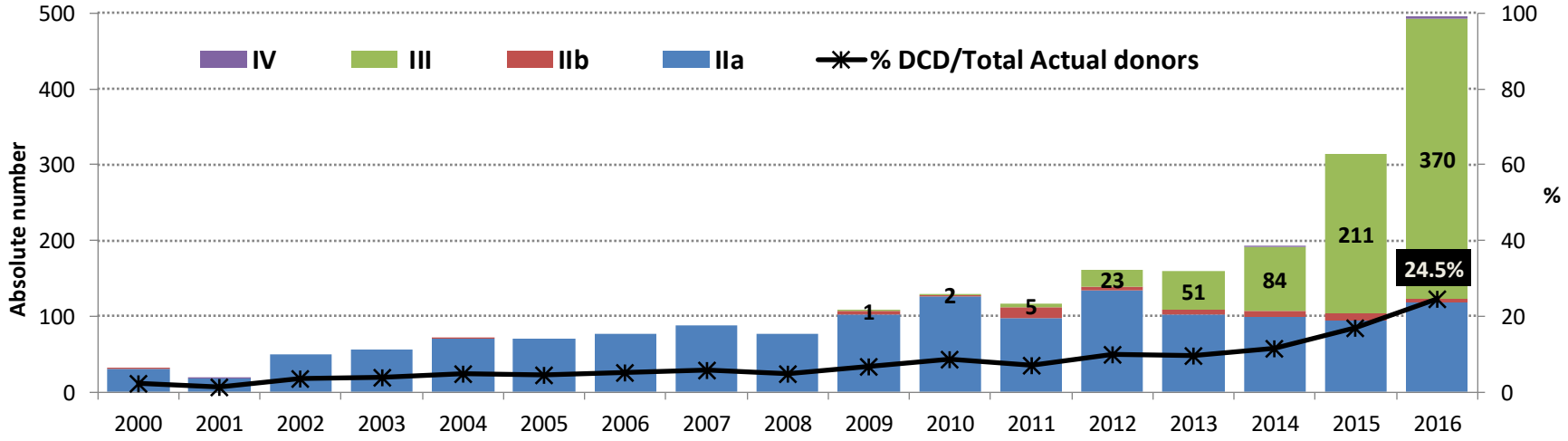
- **National protocols on:**

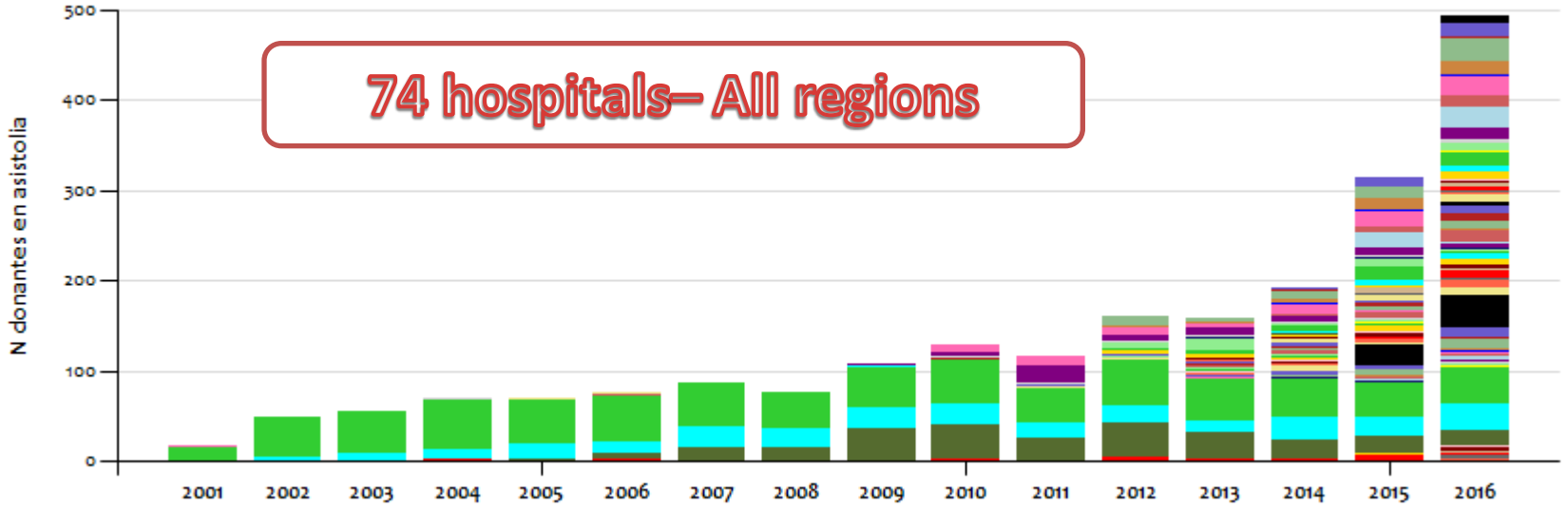
  Liver Donation and Transplantation (2015)

  Lung Donation and Transplantation (2017)

ORGAN DONORS EVOLUTION Spain







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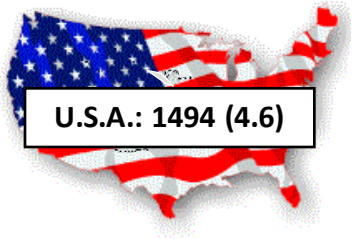
- H. GRAL. GREGORIO MARAÑÓN
- H. GRAL. DE LA PALMA
- H. GRAL. DE JEREZ DE LA FRONTERA
- H. GRAL. DE CATALUNYA
- H. GRAL. DE CASTELLÓ
- H. GRAL. DE ÁREA SANTA MARÍA DEL ROSELL/H.UNIV. STA LUCÍA
- H. GRAL. DE ALBACETE
- H. GRAL. CARLOS HAYA
- H. DONOSTIA-DONOSTIA OSPITALEA
- H. DEL MAR
- H. DE SAGUNTO
- H. DE NAVARRA
- H. DE MATARÓ
- H. DE LA RIBERA (+)
- H. DE LA MERCED.OSUNA
- H. DE GRAN CANARIA DR. NEGRIN
- H. DE CRUCES
- H. DE BASURTO
- H. DE ANTEQUERA
- H. COSTA DEL SOL (+)
- H. COMARCAL DE LA AXARQUÍA
- H. CLÍNICO UNIV. LOZANO BLESA
- H. CLÍNICO SAN CARLOS
- H. CLÍNIC I PROVINCIAL DE BARCELONA
- H. 12 DE OCTUBRE
- H. UNIV. SAN CECILIO
- FUNDACIÓN JIMÉNEZ DÍAZ-UTE
- FUNDACIÓ DE GESTIÓ SANITÀRIA DE L H. DE LA SANTA CREU I SANT PAU
- CL SAGRADO CORAZÓN, S.L.
- CHUAC (H. JUAN CANALEJO)
- CENTRE HOSPITALARI DE MANRESA (Althaia)
- C. H. XERAL-CALDE /H.LUCUS AUGUSTI.LUGO
- C. H. UNIV. DE VIGO (H. ÁLVARO CUNQUEIRO)
- C. H. DE OURENSE

DCD per Donation Hospital

DCD IN EUROPE

Absolut number (pmp) - 2015

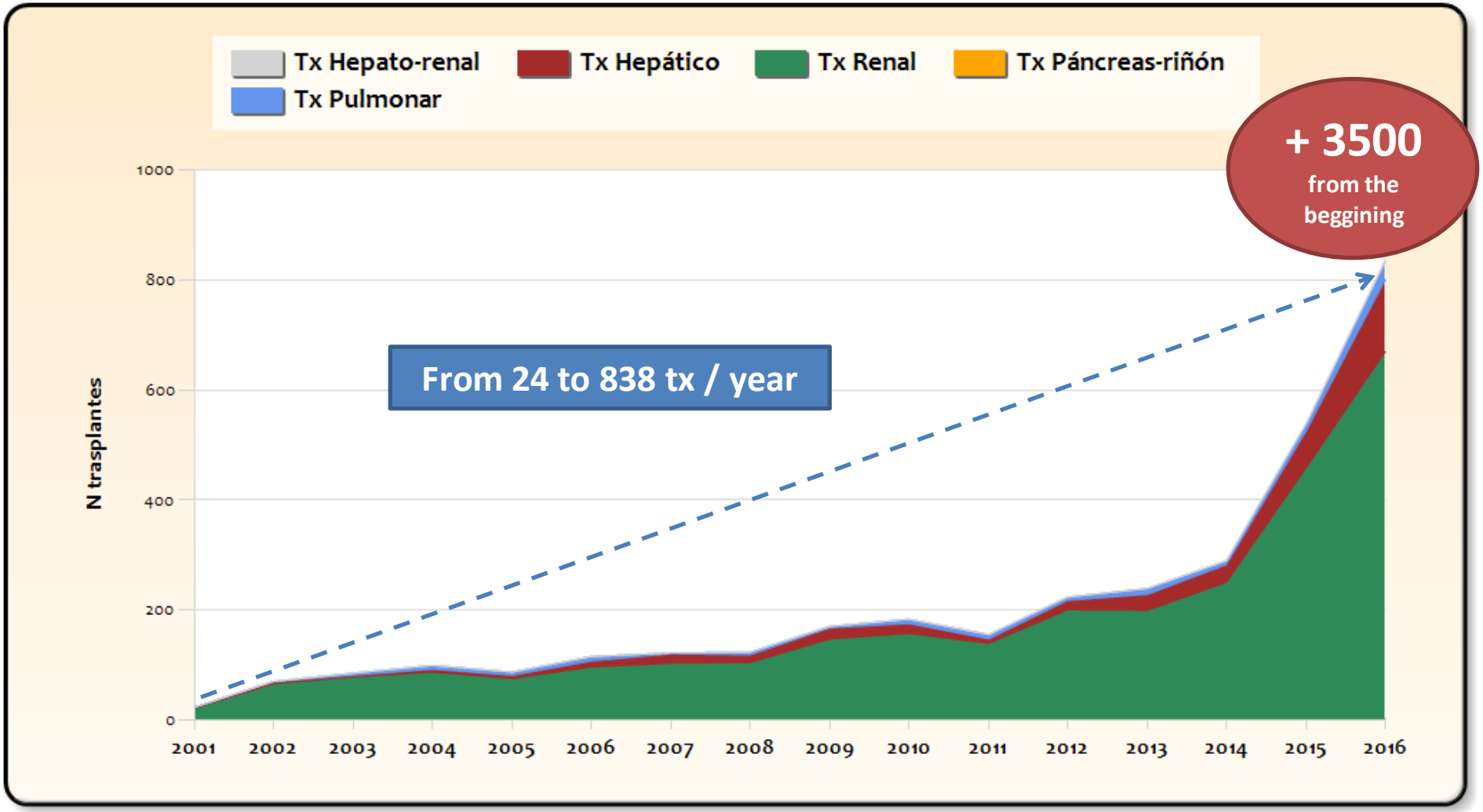


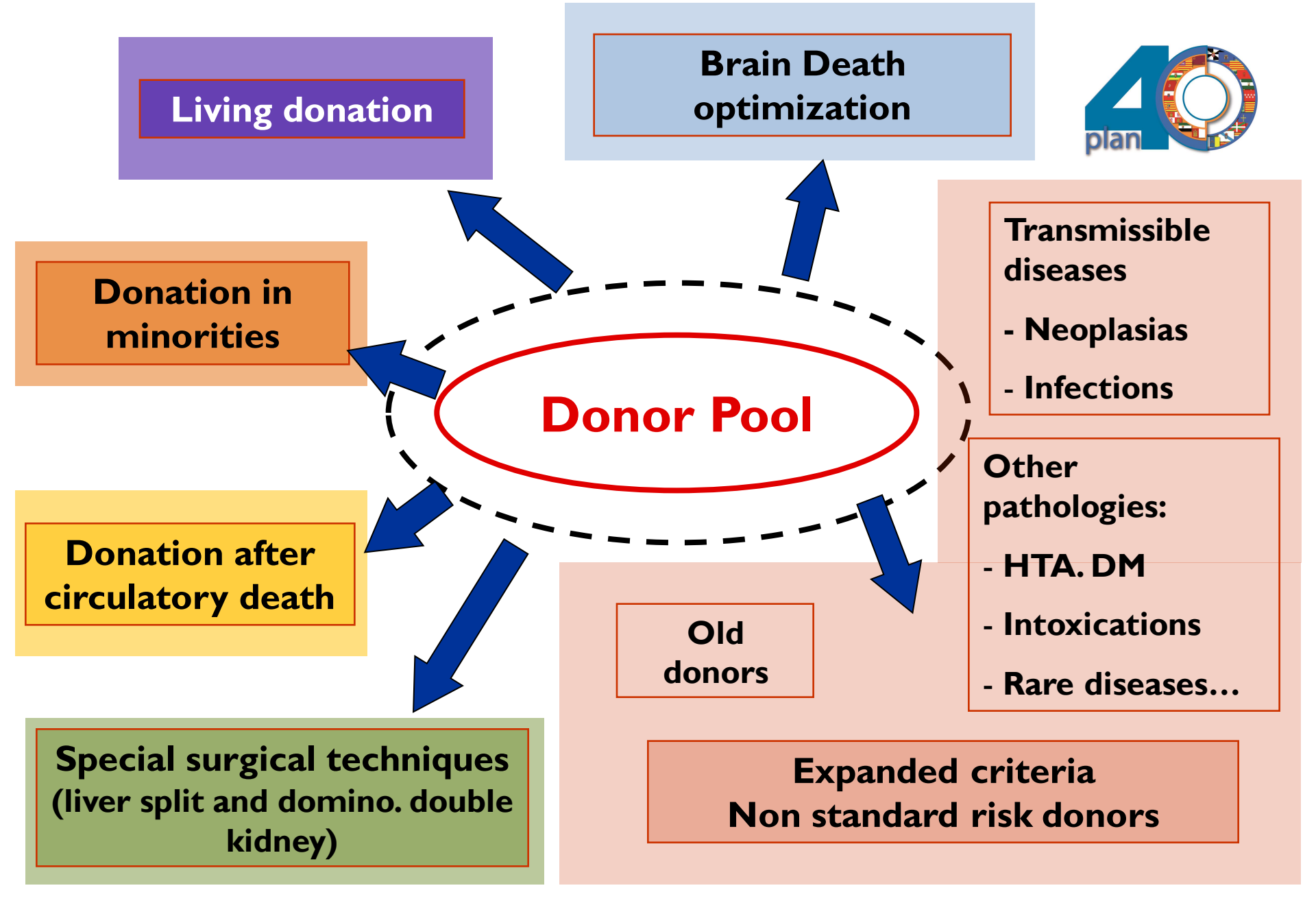
> 3 PMP
1-3 PMP
< 1 PMP

73 (0.5)
6 (1.2)
11 (5.5)
4 (0.9)
548 (8.5)
156 (9.2)
3 (0.1)
8 (0.8)
110 (9.7)
16 (1.9)
6 (0.7)
55 (0.9)
8 (0.1)
314 (6.8)
495 (10.6) 2016

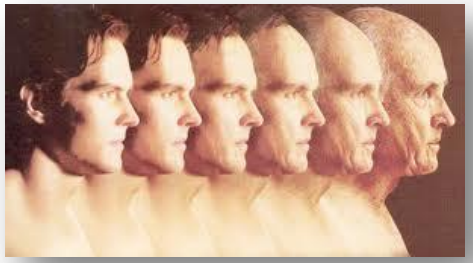
IN 2015, SPAIN WAS THE 3rd COUNTRY IN ABSOLUT NUMBERS, AFTER USA AND UK

DCD TRANSPLANTS IN SPAIN




Living donation
Brain Death optimization
plan 40
Donation in minorities
Transmissible diseases
- Neoplasias
- Infections
Donor Pool
Donation after circulatory death
Other pathologies:
- HTA. DM
- Intoxications
- Rare diseases…
Old donors
Special surgical techniques (liver split and domino. double kidney)
Expanded criteria
Non standard risk donors

The need



CHANGES IN THE PROFILE OF POTENTIAL ORGAN DONORS

PROGRESSIVE CHANGE IN ELEGIBILITY CRITERIA FOR ORGAN DONATION

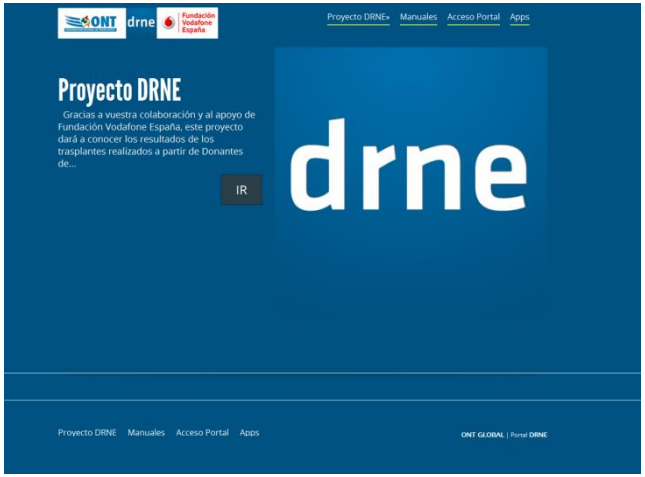
DECLINE IN MORTALITY RELEVANT TO ORGAN DONATION

IMPROVEMENTS IN THE CARE OF NEUROCRITICAL PATIENTS

Information on the quality and safety of transplants performed with organs from these donors is ESSENTIAL to guide risk-benefit assessments in the future

NON STANDARD RISK DONOR (NSRD-DRNE) PROJECT

Donors with an increased risk of donor related disease in the recipient, assumed before transplantation.



- All NSRD since 01/01/2013
- Utilization NSRD
- Follow-up recipients

6-12-24 months

Malignancies:

Prior or present history of malignancy

Infections: *3 months*

- CNS infections
- TBC
- Emerging infections
- Bacteriemias
- Endocarditis

Poisoning: *3 months*

- Cocaine
- Ecstasy
- Hydrocarbons
- Mushrooms
- Organophosphates
- Ethylene glycol Methanol
- Rodenticide
- Other

12-24 months

Other diseases:

- Myeloproliferative disorders
- Amyotrophic lateral sclerosis
- Systemic lupus erythematosus
- Multiple Sclerosis
- Other (rare diseases)

NSRD REPORT 2013-2014

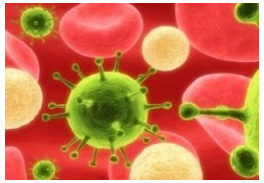
176 actual donors

155 utlized donors

430 transplants

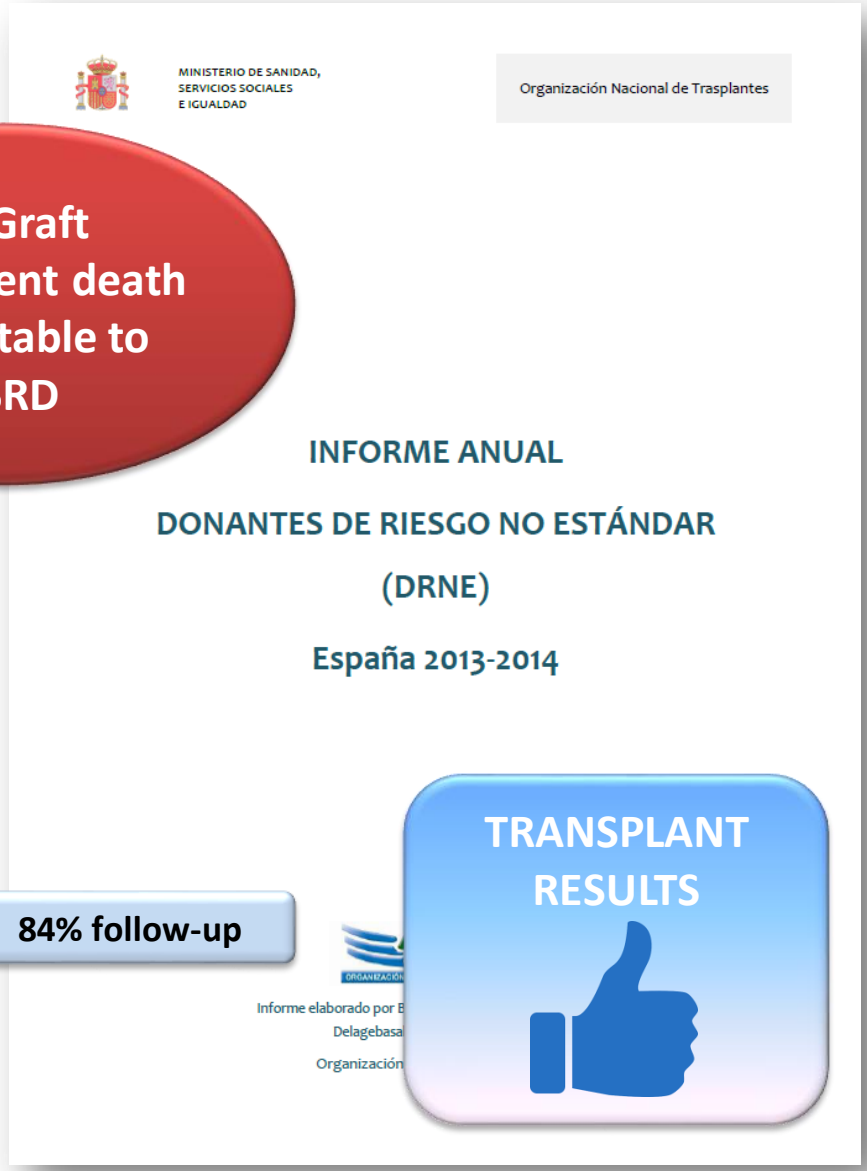
1Transmission*/Related problem

cardiac recipient HCV

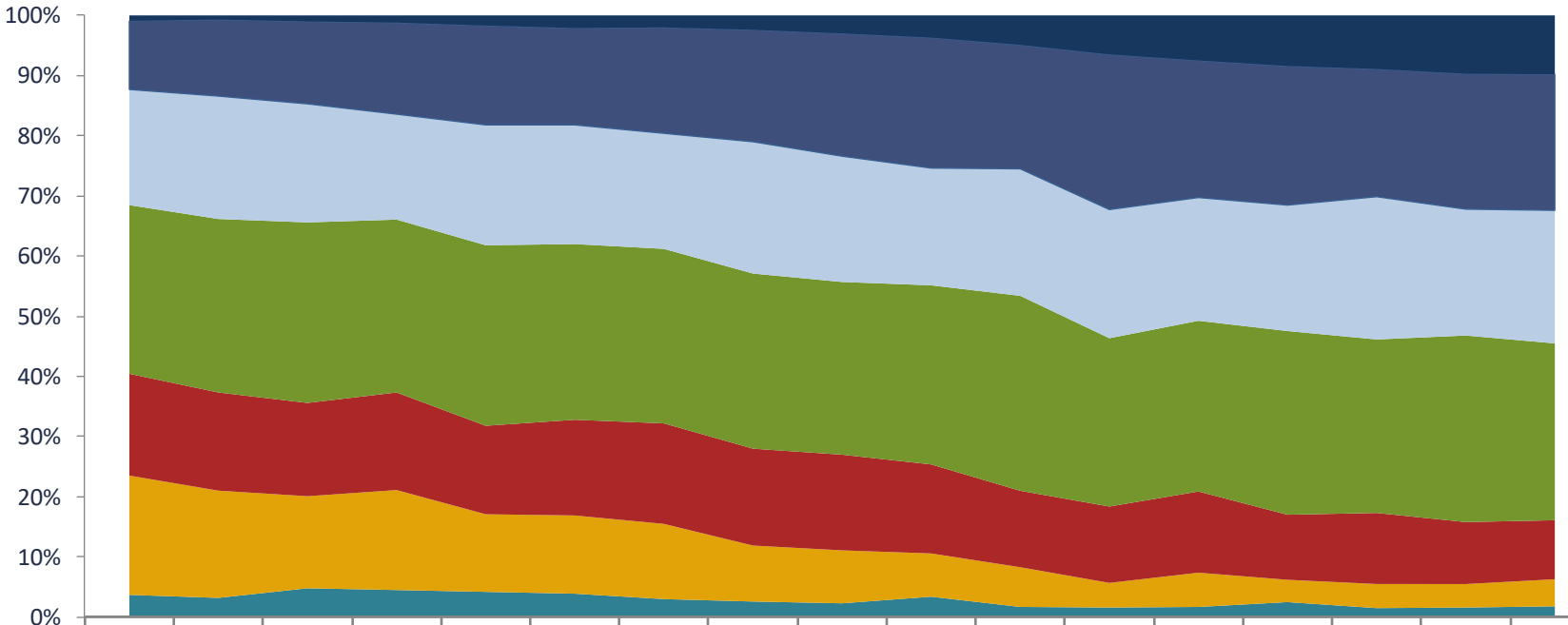


No Graft loss/Patient death attributable to NSRD

84% follow-up



AGE EVOLUTION OF DONORS



	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
≥80	0.9	0.7	1	1.2	1.7	2.1	2	2.4	3	3.7	4.9	6.5	7.5	8.4	8.9	9.7	9.8
70-79	11.4	12.7	13.7	15.2	16.5	16.1	17.6	18.6	20.4	21.7	20.6	25.8	22.8	23.1	21.2	22.5	22.6
60-69	19.2	20.4	19.7	17.5	20	19.8	19.2	21.9	20.9	19.5	21.1	21.4	20.5	20.9	23.7	21	22.1
45-59	28	28.8	30	28.7	30	29.2	29	29.1	28.7	29.8	32.4	28	28.4	30.5	28.8	31	29.4
30-44	16.9	16.3	15.5	16.2	14.7	15.9	16.7	16.1	15.9	14.8	12.7	12.7	13.5	10.8	11.8	10.3	9.8
15-29	19.8	17.8	15.3	16.6	12.9	13	12.5	9.3	8.8	7.2	6.6	4.1	5.7	3.7	4	3.9	4.5
0-14	3.7	3.2	4.8	4.5	4.2	3.9	3	2.6	2.3	3.4	1.7	1.6	1.7	2.5	1.5	1.6	1.8

>50%

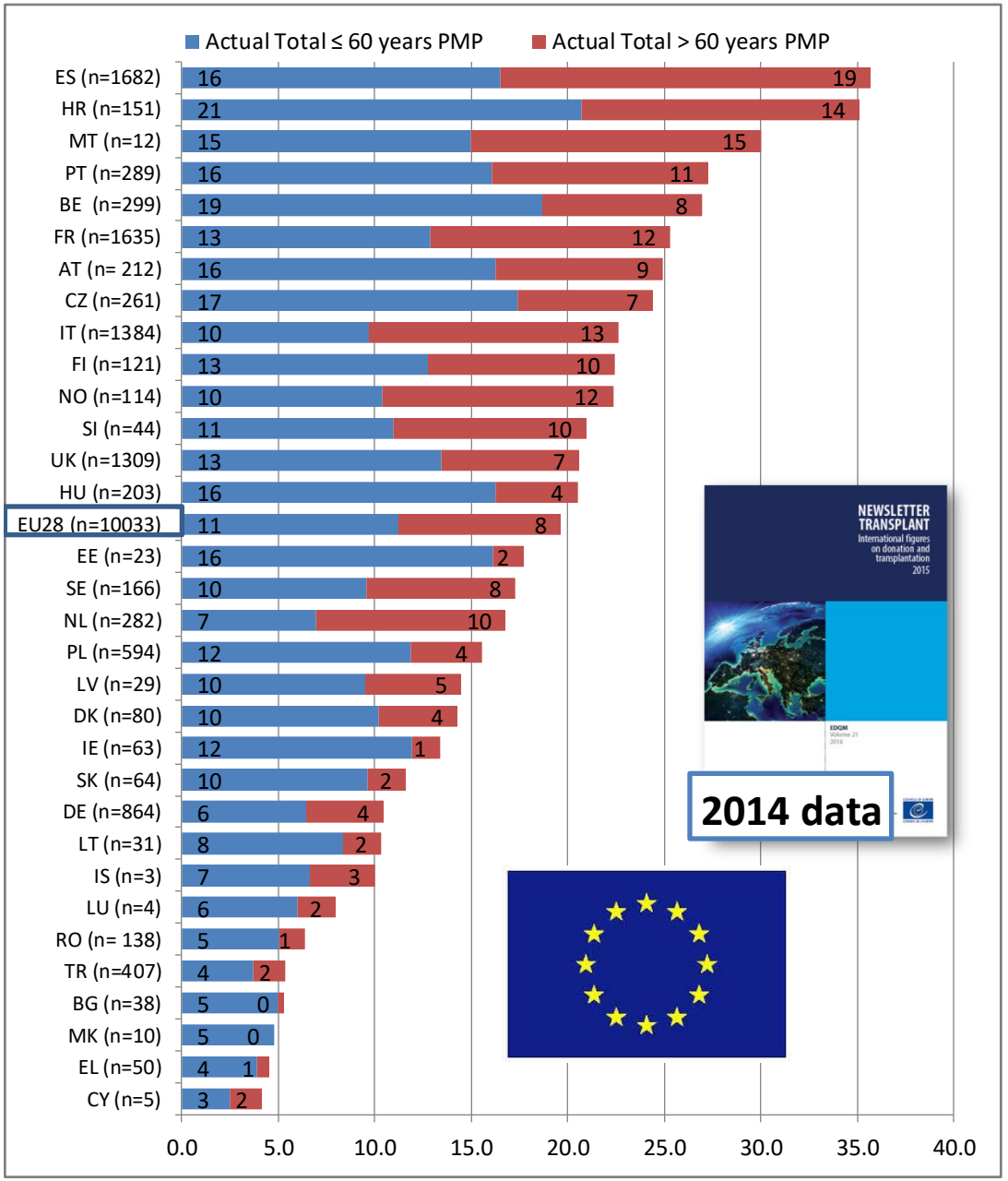
■ ≥80 ■ 70-79 ■ 60-69 ■ 45-59 ■ 30-44 ■ 15-29 ■ 0-14

OLD DONORS

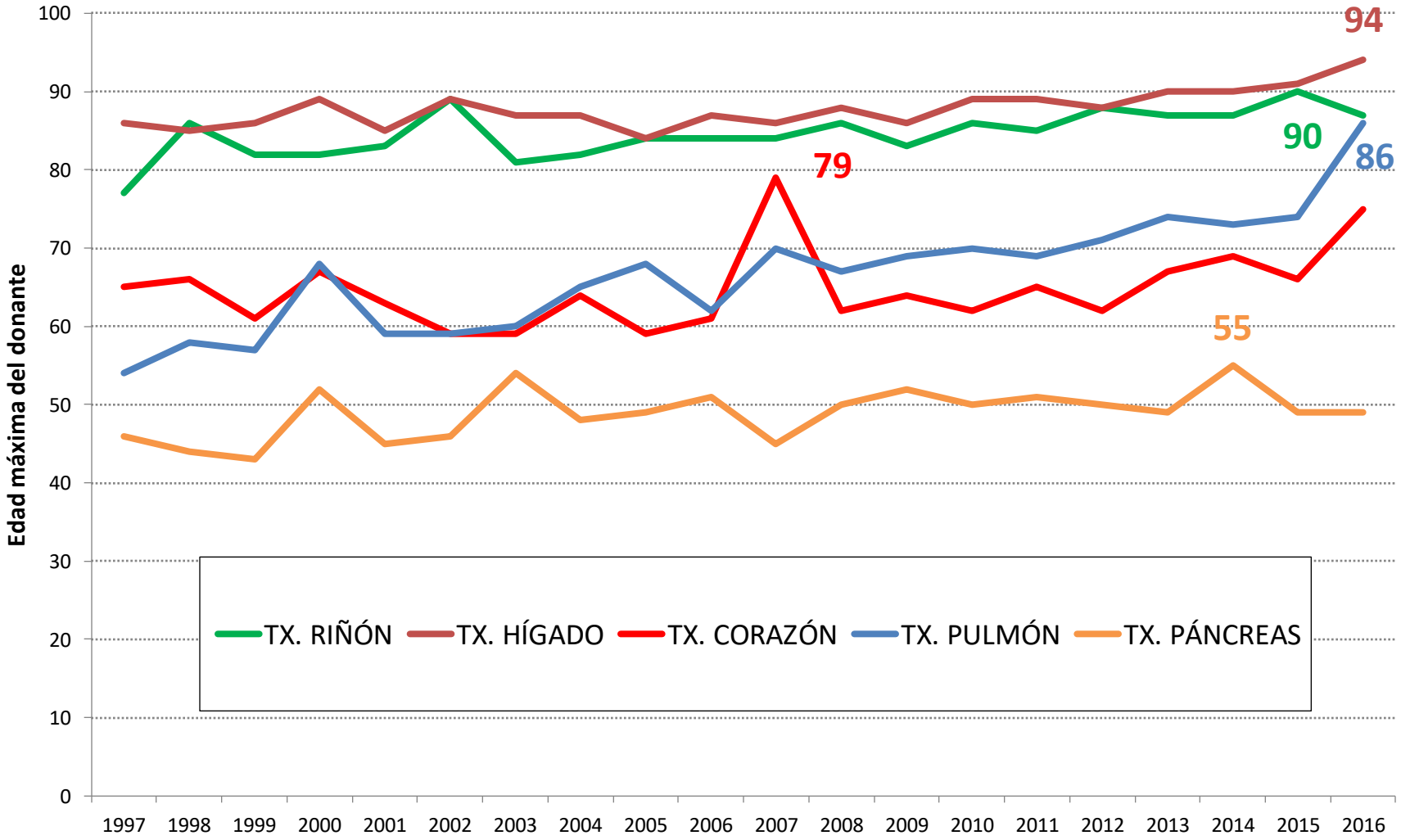
'(…)the number of donors >70 years increased from 3.8 to 8.8 pmp (a 132% increase) in Spain and they now constitute 25.4% of all Spanish organ donors.

In contrast, the number of US donors >70 years increased from 1.0 to 1.3 pmp, and they constitute only 4.4% of total deceased donors'.

Halldorson J et al, . Liver Transplant 2013; 19

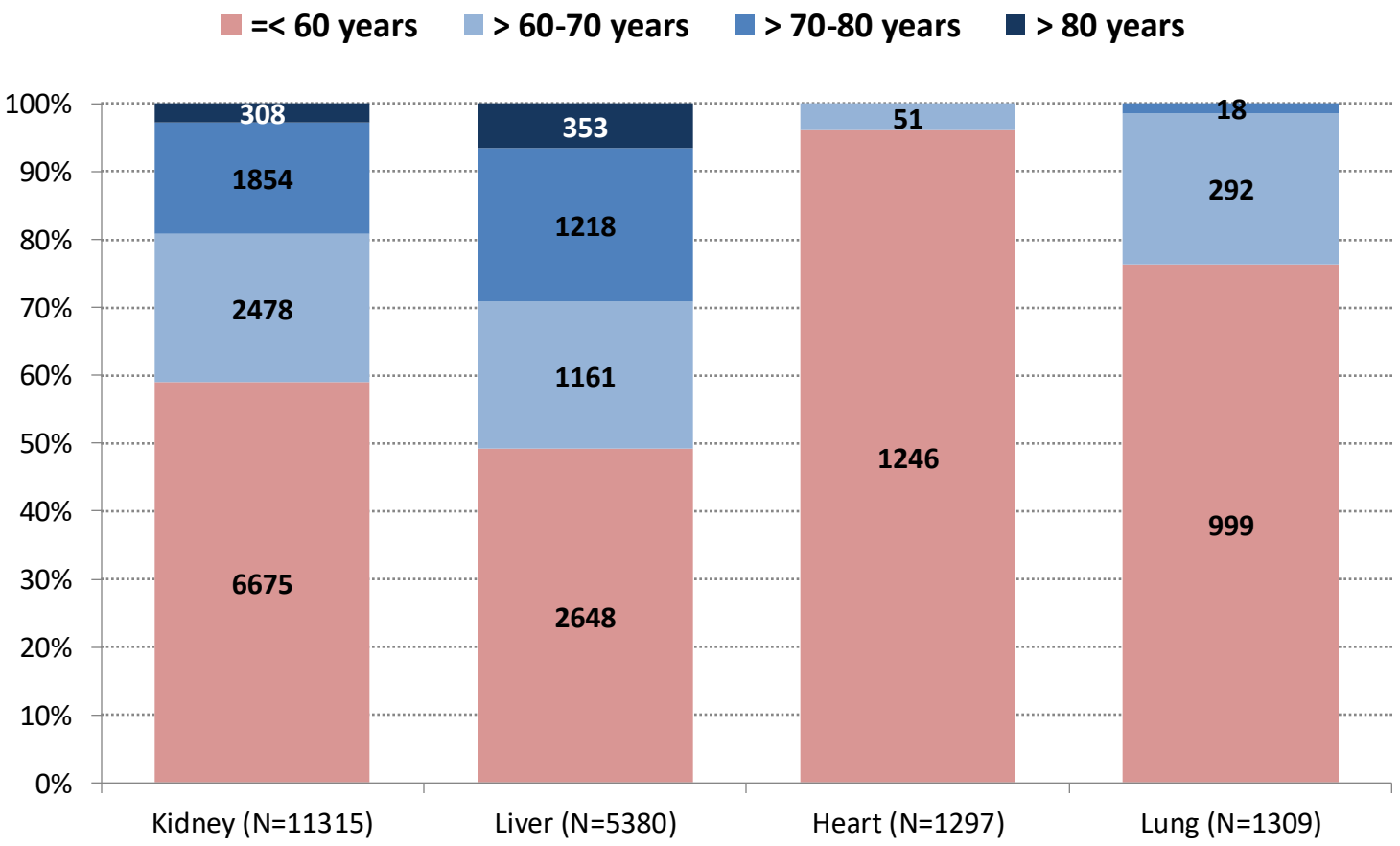


MAXIMUM DONOR AGE
(PER ORGAN TRANSPLANTED)



SOLID ORGAN TRANSPLANTS BY DONOR AGE

Spain 2011-2015



OLD DONORS

KIDNEY TRANSPLANTS- Outcomes

- OLD FOR OLD
- BETTER THAN REMAINING ON DYALISIS

Transplantation. 2008 Jun 15;85(11):1573-9. doi: 10.1097/TP.0b013e31817059a1.

Patient and graft outcomes from deceased kidney donors age 70 years and older: an analysis of the Organ Procurement Transplant Network/United Network of Organ Sharing database.

Chavalitdhamrong D[1], Gill J, Takemoto S, Madhira BR, Cho YW, Shah T, Bunnapradist S.

Author information

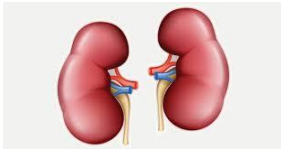
Abstract

BACKGROUND: The organ shortage has resulted in more use of older deceased donor kidneys. Data are limited on the impact of donor aged 70 years and older on transplant outcomes. We examined patient and graft outcomes of renal transplant from expanded criteria donors (ECDs) aged 70 years and older, using the Organ Procurement Transplant Network/United Network of Organ Sharing database.

METHODS: We identified 601 deceased donor transplants from donors older than 70 years from 2000 to 2005. The follow-up time was until May 2007. Allograft and patient survival were compared between recipients of transplants from older ECDs (age > or =70) and younger ECDs (age 50-69). The relative risk of graft loss and patient death we

RESULTS: The adjusted relative risks of overall graft loss (haza graft loss (HR 1.32; 95% CI 1.09-1.61), and patient death (HR older ECD kidneys. The relative risk of patient death was lower compared with recipients aged 41 to 60. In contrast, the relative were transplanted into recipients older than 60.

CONCLUSIONS: Transplants from older ECD kidneys are asso when older ECD kidneys were transplanted into recipients your



Am J Kidney Dis. 2008 Sep;52(3):553-86. doi: 10.1053/j.ajkd.2008.06.005.

A systematic review of kidney transplantation from expanded criteria donors.

Pascual J[1], Zamora J, Pirsch JD.

Author information

Abstract

BACKGROUND: During the past few years, there has been renewed interest in the use of expanded criteria donors (ECD) for kidney transplantation to increase the numbers of deceased donor kidneys available. More kidney transplants would result in shorter waiting times and limit the morbidity and mortality associated with long-term dialysis therapy.

STUDY DESIGN: Systematic review of the literature.

SETTING & POPULATION: Kidney transplantation population.

SELECTION CRITERIA FOR STUDIES: Studies were identified by using a comprehensive search through MEDLINE and EMBASE databases. Inclusion criteria were case series, cohort studies, and randomized controlled trials assessing kidney transplantation in adult recipients using ECDs.

PREDICTOR: A special focus was given to studies comparing the evolution of kidney transplantation between standard criteria donors (defined as a donor who does not meet criteria for donation after cardiac death or ECD) and ECDs (defined as any brain-dead donor aged > 60 years or a donor aged > 50 years with 2 of the following conditions: history of hypertension, terminal serum creatinine level >or= 1.5 mg/dL, or death resulting from a cerebrovascular accident).

OUTCOMES: Criteria used to define and select ECDs, practice patterns, long-term outcomes, early complications, and some patient issues, such as selection criteria and immunosuppressive management.

RESULTS: ECD kidneys have worse long-term survival than standard criteria donor kidneys. The optimal ECD kidney for donation depends on adequate glomerular filtration rate and acceptable donor kidney histological characteristics, albeit the usefulness of biopsy is debated.

LIMITATIONS: This review is based mainly on data from observational studies, and varying amounts of bias could be present. We did not attempt to quantitatively analyze the effect of ECD kidneys on kidney transplantation because of the huge heterogeneity found in study designs and definitions of ECD.

CONCLUSIONS: Based on the available evidence, we conclude that patients younger than 40 years or scheduled for kidney retransplantation should not receive an ECD kidney. Patients 40 years or older, especially with diabetic nephropathy or nondiabetic disease, but a long expected waiting time for kidney transplantation, show better survival receiving an ECD kidney than remaining on dialysis therapy.

Transplant Proc. 2009 Jul-Aug;41(6):2379-81. doi: 10.1016/j.transproceed.2009.06.156.

Kidneys from elderly deceased donors discarded for transplantation.

Andrés A[1], Polanco N, Cebrian MP, Sol Vereda M, Vazquez S, Nuño E, Bello T, Gutierrez E, Gonzalez E, Praga M, Morales E, Morales JM, Leiva O, Aguirre F, Diaz R.

Author information

Abstract

Although deceased donors older than 60 years of age (D > 60) are increasing in number, little information exists on the rate of discarded kidneys from these aged individuals. This study sought to analyze causes of discard of kidneys from D > 60. Since 1997, we have transplanted kidneys from D > 60 into elderly recipients after assessing their functional and anatomical viability. Among 3444 renal offers for transplantation between 1997 and 2005, 1967 (57%) came from D > 60. Of these, 1145 offers were discarded, because the kidney donor was not adequate (n = 470) or because there was no elderly recipient on our waiting list (n = 675). We also examined 1745 kidneys, 822 (47%) of which came from D > 60. The percentage of discarded kidneys due to macroscopic or microscopic alterations was 46% in the D > 60 group compared with 14.7% in the donor group younger than 60 years of age (D < 60; P < .01). We transplanted 443 kidneys from D > 60 (85 dual, 273 single) to 358 recipients of matching age and 900 kidneys from D < 60. Three-year death-censored actuarial graft survival rate was 83% for D > 60 compared with 89% for D < 60 transplant (P = not significant). In conclusion, kidneys from D > 60 were discarded for transplantation mainly because there was no elderly recipient on the waiting list and due to macroscopic or microscopic alterations. Given the increasing offer of kidneys from D > 60 and the good results of transplantation with these aged kidneys in elderly recipients, the indications for kidney transplantation should be expanded to include more of the elderly population on dialysis to the waiting list.

OLD DONORS

LIVER TRANSPLANTS- Outcomes

Submit a Manuscript: http://www.wjgnet.com/esps/
Help Desk: http://www.wjgnet.com/esps/helpdesk.aspx
DOI: 10.3748/wjg.v22.i21.4966

World J Gastroenterol 2016 June 7; 22(21): 4966-4976
ISSN 1007-9327 (print) ISSN 2219-2840 (online)

TOPIC HIGHLIGHT

2016 Liver Transplantation: Global view

How important is donor age in liver transplantation?

Alberto Lué, Estela Solanas, Pedro Baptista, Sara Lorente, Juan J Araiz, Agustin Garcia-Gil, M Trinidad Serrano

Donor age is not the only relevant factor in the outcome of LT, however, surgical factors such as IT or hemodynamic instability during surgery, and recipient factors, such as MELD score are also essential. Therefore, avoiding these factors as much as possible in LT performed with elderly donors ***may lead to outcomes similar to those with transplants performed with younger donors***

Table 1 Studies that analyze impact of donor age on liver transplant outcomes

Ref.	Type of donor	Cut-off age	No. of patients	Outcomes
Adam *et al*[5]	Deceased donor	< 55 yr vs > 65 yr	80347	Higher graft survival with donors younger than 55 yr
Adam *et al*[6]	Deceased donor	Multiple age groups	41522	No differences in one-year survival
Cuervas-Mons *et al*[9]	Deceased donor	55 yr	18568	Lower graft 5-yr survival rate with older donors
Feng *et al*[10]	Deceased donor	60 yr	20023	Higher rate of graft failure with older donors
Reese *et al*[11]	Deceased donor	45 yr	14756	Higher rate of graft failure at 90 d after LT with older donors
Serrano *et al*[12]	Deceased donor	60 yr	149	Lower graft survival rate with older donors
Anderson *et al*[13]	Deceased donor	60 yr	741	No differences were observed
Alamo *et al*[14]	Deceased donor	70 yr	129	No differences were observed in selected recipients (non HCV, low MELD, younger than 60 yr)
Kim *et al*[15]	Deceased donor	65 yr	100	Donor age should not be an absolute contraindication

Ann Surg. 2017 Feb;265(2):388-396. doi: 10.1097/SLA.0000000000001681.

Actual Risk of Using Very Aged Donors for Unselected Liver Transplant Candidates: A European Single-center Experience in the MELD Era.

Bertuzzo VR[1], Cescon M, Odaldi F, Di Laudo M, Cucchetti A, Ravaioli M, Del Gaudio M, Ercolani G, D'Errico A, Pinna AD.

Author information

Abstract

OBJECTIVE: To evaluate the whole experience of liver transplantation (LT) with donors ≥70 years in a single center not applying specific donor/recipient matching criteria.

BACKGROUND: LT with very old donors has historically been associated with poorer outcomes. With the increasing average donor age and the advent of Model for End-stage Liver Diseases (MELD) score-based allocation criteria, an optimal donor/recipient matching is often unsuitable.

METHODS: Outcomes of all types of LTs were compared according to 4 study groups: patients transplanted between 1998 and 2003 with donors <70 (group 1, n = 396) or ≥70 years (group 2, n = 88); patients transplanted between 2004 and 2010 with donors <70 (group 3, n = 409), or ≥70 years (group 4, n = 190). From 2003, graft histology was routinely available before cross-clamping, and MELD-driven allocation was adopted.

RESULTS: Groups 1 and 2 were si
lower rate of moderate-to-severe g
median donor age, recipient age, a
decreased. Five-year graft survival
(P = 0.129). Transplants performed
treatments were independently ass

CONCLUSIONS: Even without spe
with appropriate donor manageme

Transplant Proc. 2016 Nov;48(9):2856-2858. doi: 10.1016/j.transproceed.2016.06.063.

Octogenarian Donors in Liver Transplantation.

Gastaca M[1], Guerra M[2], Alvarez Martinez L[3], Ruiz P[2], Ventoso A[2], Palomares I[2], Prieto M[2], Matarranz A[2], Valdivieso A[4], Ortiz de Urbina J[2].

Author information

Abstract

INTRODUCTION: Due to the disparity between the number of patients on the list for liver transplantation and the availability of organs, the use of older donors has become necessary. The aim of this study was to investigate the outcomes of liver transplantation using octogenarian donors.

METHODS: From December 2003 to February 2016, 777 liver transplantations were performed at our institution, 33 of them (4.2%) with donors 80 years old and above. Our policy for the acceptance of these donors is based on preoperative liver function tests, donor hemodynamic stability, and intraoperative normal gross aspect. Octogenarian grafts were deliberately not assigned to retransplantations or to recipients with multiple previous surgical procedures or extensive portal thrombosis.

RESULTS: Mean donor age was 82.7 ± 2.1 years, with a range between 80 and 88. Only 12.1% suffered hemodynamic instability during the intensive care unit stay. Three donors (9.1%) had a history of diabetes mellitus. The mean Model for End-Stage Liver Disease score among recipients was 14.7 ± 5.6. Mean cold ischemia time was 302 ± 61 minutes. After a median follow-up of 18.5 months (range 7.5 to 47.5), no graft developed primary nonfunction. We observed hepatic artery thrombosis in 1 patient (3%) and biliary complications in 4 patients (12.5%). There was 1 case of ischemic-type biliary lesion, although it was related to hepatic artery thrombosis. Patient survival at 1 and 3 years was 90.3%, whereas graft survival was 92.6% and 86.4%, respectively.

CONCLUSIONS: Excellent mid-term results can be obtained after liver transplantation with octogenarian donors with strict donor selection and adequate graft allocation.

Supervivencia	1 mes	3 meses	1 año	3 años	5 años	10 años
0-2 años (483)	83.8%	80.7%	75.8%	73.4%	71%	67.9%
3-15 años (404)	88.9%	88.4%	84%	78%	75.5%	68.6%
16-39 años (1533)	91.6%	88.2%	81.8%	74.4%	69.7%	59.8%
40-59 años (11091)	91.9%	88.2%	81.5%	72.6%	66.6%	55.2%
≥60 años (5583)	92%	87.7%	79%	69%	62.2%	47.6%

OLD DONORS

LUNG TRANSPLANTS- Outcomes

Lung Transplantation With Lungs From Older Donors: Recipient and Surgical Factors Affect Outcomes

Norihisa Shigemura,[1,3] Tetsuya Horai,[1] Jay K. Bhama,[1] Jonathan D'Cunha,[1] Diana Zaldonis,[1] Yoshiya Toyoda,[1] Joseph M. Pilewski,[2] James D. Luketich,[1] and Christian A. Bermudez[1]

Background. A shortage of donors has compelled the use of extended-criteria donor organs in lung transplantation. The purpose of this study was to evaluate the impact of using older donors on outcomes after lung transplantation using current protocols.

Methods. From January 2003 to August 2009, 593 lung transplants were performed at our institution. We compared 87 patients (14.7%) who received lungs from donors aged 55 years or older with 506 patients who received lungs from donors less than 55 years old. We also examined risk factors for mortality in recipients of lungs from older donors.

Results. The incidence of major complications including severe primary graft dysfunction and early mortality rates were similar between the groups. However, posttransplant peak FEV1 was lower in the patients who received lungs from older donors (71.7% vs. 80.7%, $P<0.05$). In multivariate analysis, recipient pulmonary hypertension (transpulmonary pressure gradient >20 mm Hg) and prolonged intraoperative cardiopulmonary bypass were significant risk factors for mortality in the recipients of lungs from older donors.

Conclusions. This large, single-center experience demonstrated that transplanting lungs from donors older than 55 years did not yield worse short- or long-term outcomes as compared with transplanting lungs from younger donors. However, transplanting lungs from older donors into recipients with pulmonary hypertension or recipients who required prolonged cardiopulmonary bypass increased the risk for mortality. Although lungs from older donors should not be excluded because of donor age alone, surgeons should carefully consider their patient selection criteria and surgical plans when transplanting lungs from older donors.

es, Pulmonary hypertension.

Lung transplantation with lungs from donors fifty years of age and older

Stefan Fischer, MD, MSc[a]
Bernhard Gohrbandt, MD[a]
Pascal Struckmeier, MS[a]
Jost Niedermeyer, MD[b]
Andro Simon, MD[a]
Christian Hagl, MD[a]
Klaus Kallenbach, MD[a]
Axel Haverich, MD[a]
Martin Strüber, MD[a]

Background: A shortage of donors has led to the progressive expansion of criteria for donor selection in lung transplantation. The outcome of recipients of lungs from donors aged 50 years or older is analyzed systematically.

Methods: From March 1998 to June 2003, 49 recipients received lungs from donors aged 50 years or older (range 50-64 years, mean 54 ± 3 years). This group of recipients was compared with 244 patients receiving lungs from donors aged less than 50 years (range 7-49 years, mean 32 ± 11 years). This study was undertaken on all 293 patients at our institution who received Perfadex-preserved lungs (Vitrolife, Göteborg, Sweden).

Results: Recipient age, sex, and indications for transplant did not differ significantly between groups. Also, the percentage of the different types of transplants (bilateral or single lung transplantation) performed was equal in both cohorts. Donor Pao_2/Fio_2 ratios before lung retrieval (415 ± 91 vs 439 ± 113, respectively) and length of ischemic time (347 ± 67 minutes vs 351 ± 84 minutes, respectively) did not differ significantly between the older and younger donor groups. The following posttransplant parameters were also not statistically different: first Pao_2/Fio_2 at intensive care unit arrival (274 ± 125 in the older donor group vs 253 ± 119 in the younger donor group, respectively), mechanical ventilation time (328 ± 427 hours vs 269 ± 425 hours, respectively), and length of stay in the intensive care unit (16 ± 18 days vs 14 ± 18 days, respectively). Recipient survival in the older and younger donor groups at 30 days, 3, 6, 12, 24, and 60 months was 77% ± 6%, 75% ± 6%, 73% ± 7%, 73% ± 7%, 68% ± 5%, and 68% ± 4% versus 86% ± 2%, 83% ± 3%, 80% ± 3%, 78% ± 3%, 71% ± 4%, and 66% ± 4%, respectively.

Conclusions: Lung grafts from elderly donors have been considered as marginal organs for transplantation. However, this study indicates that transplantation of lungs from carefully selected donors aged 50 years or more may lead to similar short- and long-term outcomes compared with lungs from younger donors. The use of lungs from elderly donors may help to increase the number of donor organs in lung transplantation.

From the Hannover Thoracic Transplant Program, Division of Thoracic- and Cardiovascular Surgery,[a] and Department of Respiratory Medicine,[b] Hannover Medical School, Hannover, Germany.

Presented at the Twenty-fourth Annual Meeting of the International Society for Heart and Lung Transplantation (ISHLT), 2004, San Francisco, Calif.

Received for publication April 14, 2004; revisions received July 26, 2004; accepted for publication July 28, 2004.

Address for reprints: Martin Strüber, MD, Director, Hannover Thoracic Transplant Program, Division of Cardiothoracic and Vascular Surgery, Hannover Medical School, Carl-Neuberg-Strasse 1, Hannover, 30625, Germany (E-mail: strueber@thg.mh-hannover.de).

J Thorac Cardiovasc Surg 2005;129:919-25

0022-5223/$30.00

doi:10.1016/j.jtcvs.2004.07.053

Lung transplantation has evolved during the past 2 decades to become a viable treatment option for several end-stage pulmonary diseases.[1] Although the number of annually performed lung transplant procedures still increases,[2] donor organ availability has become a serious problem, and the demand for donor lungs clearly exceeds the supply. This lack of donor organs has led to an increasing mortality of patients on the lung transplant waiting list. Obviously, the risk of mortality by the

TX

RECIPIENT SELECTION

J Heart Lung Transplant. 2015 Oct;34(10):1325-33. doi: 10.1016/j.healun.2015.06.002. Epub 2015 Jun 10.

Survival and spirometry outcomes after lung transplantation from donors aged 70 years and older.

Sommer W[1], Ius F[1], Salman J[1], Avsar M[1], Tudorache I[1], Kühn C[1], Wiegmann B[1], Marsch G[1], Kaufeld T[1], Zinne N[1], Fuehner T[2], Greer M[2], Gottlieb J[2], Boethig D[3], Haverich A[1], Welte T[2], Warnecke G[4].

Author information

Abstract

BACKGROUND: Mediocre donation rates and increasing demand for lung transplantation leads transplant centers to consider extended-criteria donor lungs. Arguably, the largest remaining non-utilized lung donor segment is the elderly individual, already considered for visceral organ donation but not thoracic. So far, transplantation of donor lungs aged ≥ 70 years is rarely reported, and recipient outcomes are unknown. Accordingly, we report a single-center series of lung transplantations from donors aged ≥ 70 years and compare outcomes with contemporary lung transplantations from younger donors.

METHODS: All bilateral lung transplantations performed at our center between March 2011 and July 2014 were analyzed, and 2 cohorts were built according to lung donor age.

RESULTS: A total of 440 bilateral lung transplantations were performed from 413 donors aged <70 years, and 27 donors aged ≥70 years. Donor characteristics did not differ in sex, donor time on mechanical ventilation before retrieval, or donor partial pressure of arterial oxygen/fraction of inspired oxygen ratio. Older donors were significantly less often positive for smoking history (43.7% vs 14.8%, p = 0.003) or for abnormal bronchoscopy results (52.9% vs 15.8%, p = 0.002). Recipients receiving donor lungs aged <70 years were younger than those receiving older donor lungs ≥ 70 (49.8 [range, 35-58] vs 58 [range, 53-62] years, p < 0.0001). Underlying diagnoses did not differ significantly between the groups. Post-operative mechanical ventilation times (15 [range, 10-59] vs 27.5 [range, 10-75.8] hours), intensive care unit stays (3 [range, 1-5] vs 3 [range, 1-8] days), and total hospital lengths of stay (24 [range, 22-40.5] vs 24 [range, 22-40] days) of the recipients did not differ significantly between the two groups. The percentage predicted forced expiratory volume in 1 second was 86.5% ± 26.2% 12 months after transplantation of younger lungs vs 72.2% ± 23.8% (p = 0.01) after transplantation of older lungs. Differentiating the spirometry findings according to underlying diseases showed significantly lower forced expiratory volume in 1 second values after transplantation of donor lungs aged ≥70 only in idiopathic pulmonary fibrosis recipients but not in emphysema patients. Patient survival up to 36 months was not significantly different, with 1-year survival being 92.9% for younger vs 95.5% for older donor lungs.

CONCLUSION: Use of donor lungs aged ≥70 years for transplantation is safe, without compromising survival. However, spirometry findings after transplantation with donors ≥70 years indicate better functional outcomes in emphysema recipients than in idiopathic pulmonary fibrosis recipients.

Transplantation:
27 October 2014 - Volume 98 - Issue 8 - p 903–908
doi: 10.1097/TP.0000000000000134
Clinical and Translational Research

Lung Transplantation With Lungs From Older Donors: Recipient and Surgical Factors Affect Outcomes

Shigemura, Norihisa[1,3]; Horai, Tetsuya[2]; Bhama, Jay K.[1]; D'Cunha, Jonathan[1]; Zaldonis, Diana[1]; Toyoda, Yoshiya[1]; Pilewski, Joseph M.[2]; Luketich, James D.[1]; Bermudez, Christian A.[1]

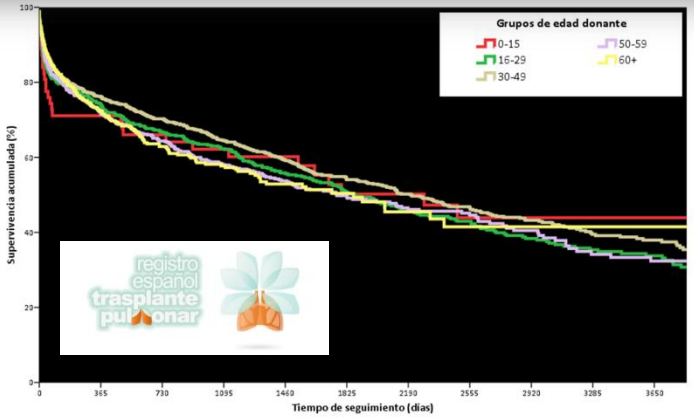
Abstract

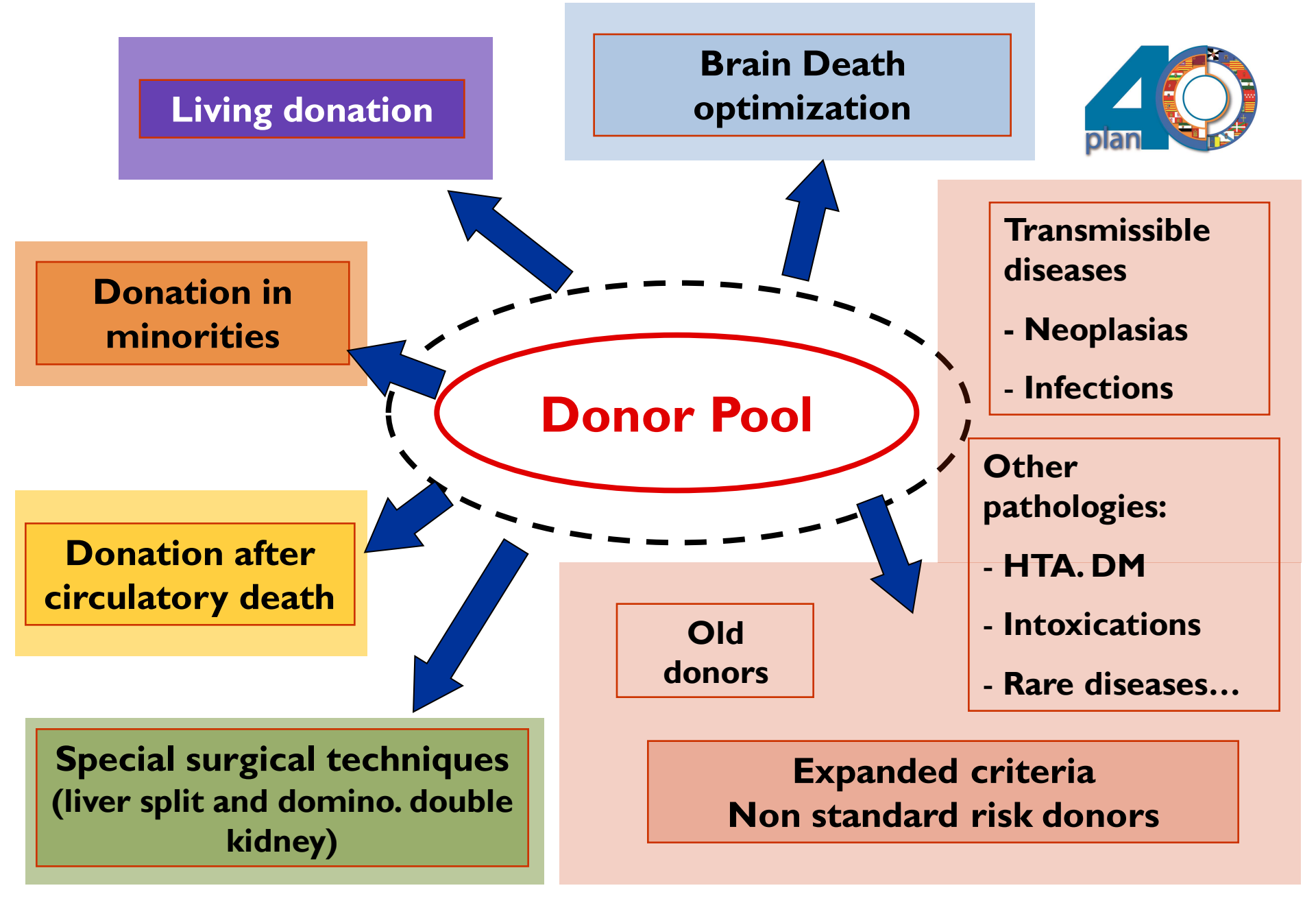
Background: A shortage of donors has compelled the use of extended-criteria donor organs in lung transplantation. The purpose of this study was to evaluate the impact of using older donors on outcomes after lung transplantation using current protocols.

Methods: From January 2003 to August 2009, 593 lung transplants were performed at our institution. We compared 87 patients (14.7%) who received lungs from donors aged 55 years or older with 506 patients who received lungs from donors less than 55 years old. We also examined risk factors for mortality in recipients of lungs from older donors.

Results: The incidence of major complications including severe primary graft dysfunction and early mortality rates were similar between the groups. However, posttransplant peak FEV1 was lower in the patients who received lungs from older donors (71.7% vs. 80.7%, $P<0.05$). In multivariate analysis, recipient pulmonary hypertension (transpulmonary pressure gradient >20 mm Hg) and prolonged intraoperative cardiopulmonary bypass were significant risk factors for mortality in the recipients of lungs from older donors.

Conclusions: This large, single-center experience demonstrated that transplanting lungs from donors older than 55 years did not yield worse short- or long-term outcomes as compared with transplanting lungs from younger donors. However, transplanting lungs from older donors into recipients with pulmonary hypertension or recipients who required prolonged cardiopulmonary bypass increased the risk for mortality. Although lungs from older donors should not be excluded because of donor age alone, surgeons should carefully consider their patient selection criteria and surgical plans when transplanting lungs from older donors.




Living donation
Brain Death optimization
plan 40
Donation in minorities
Transmissible diseases
- Neoplasias
- Infections
Donor Pool
Donation after circulatory death
Other pathologies:
- HTA. DM
- Intoxications
- Rare diseases…
Old donors
Special surgical techniques (liver split and domino. double kidney)
Expanded criteria
Non standard risk donors

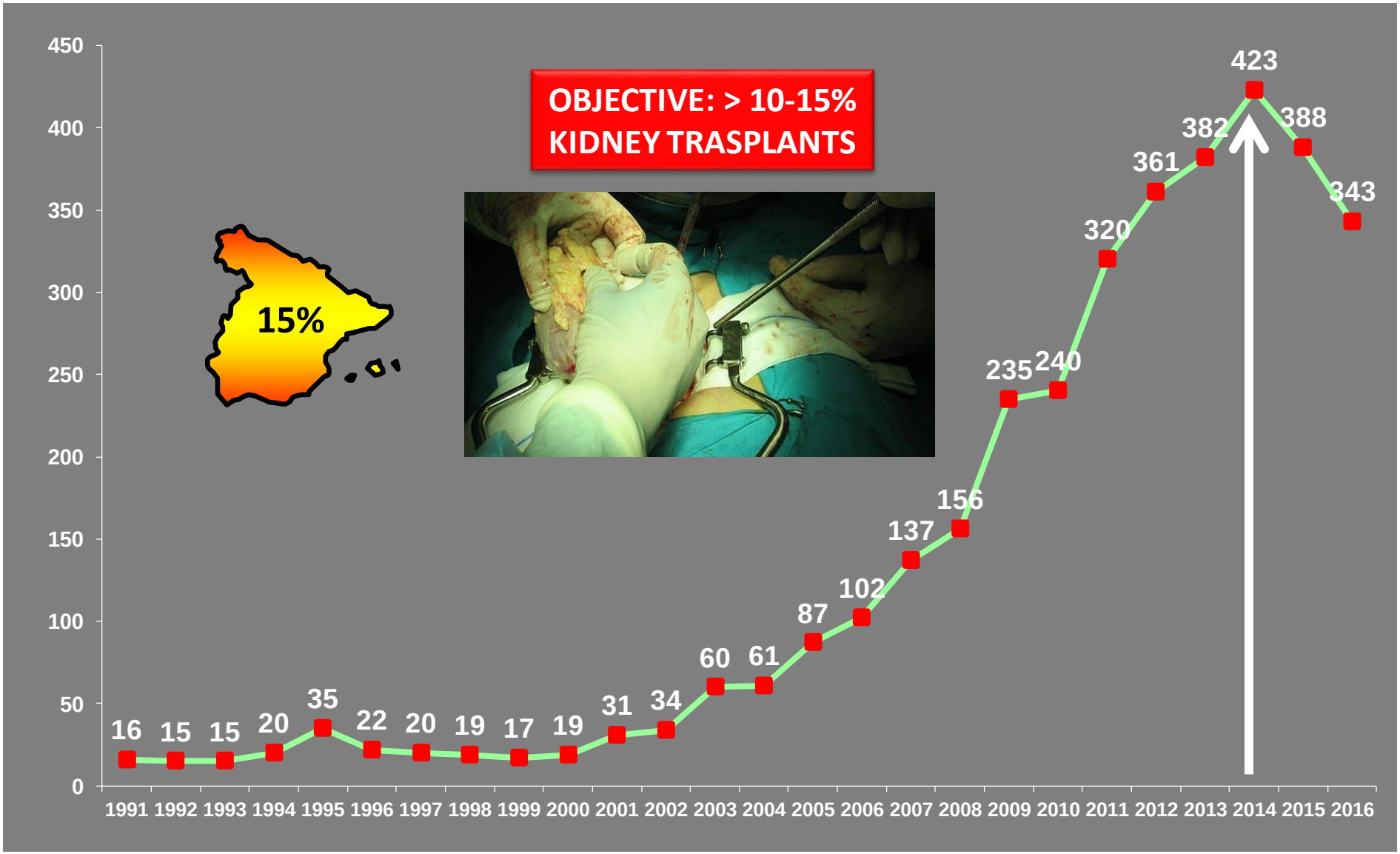
FUNDACIÓN MM
ONT

23 de Junio
2008
AUDITORIO FUNDACIÓN MUTUA MADRILEÑA

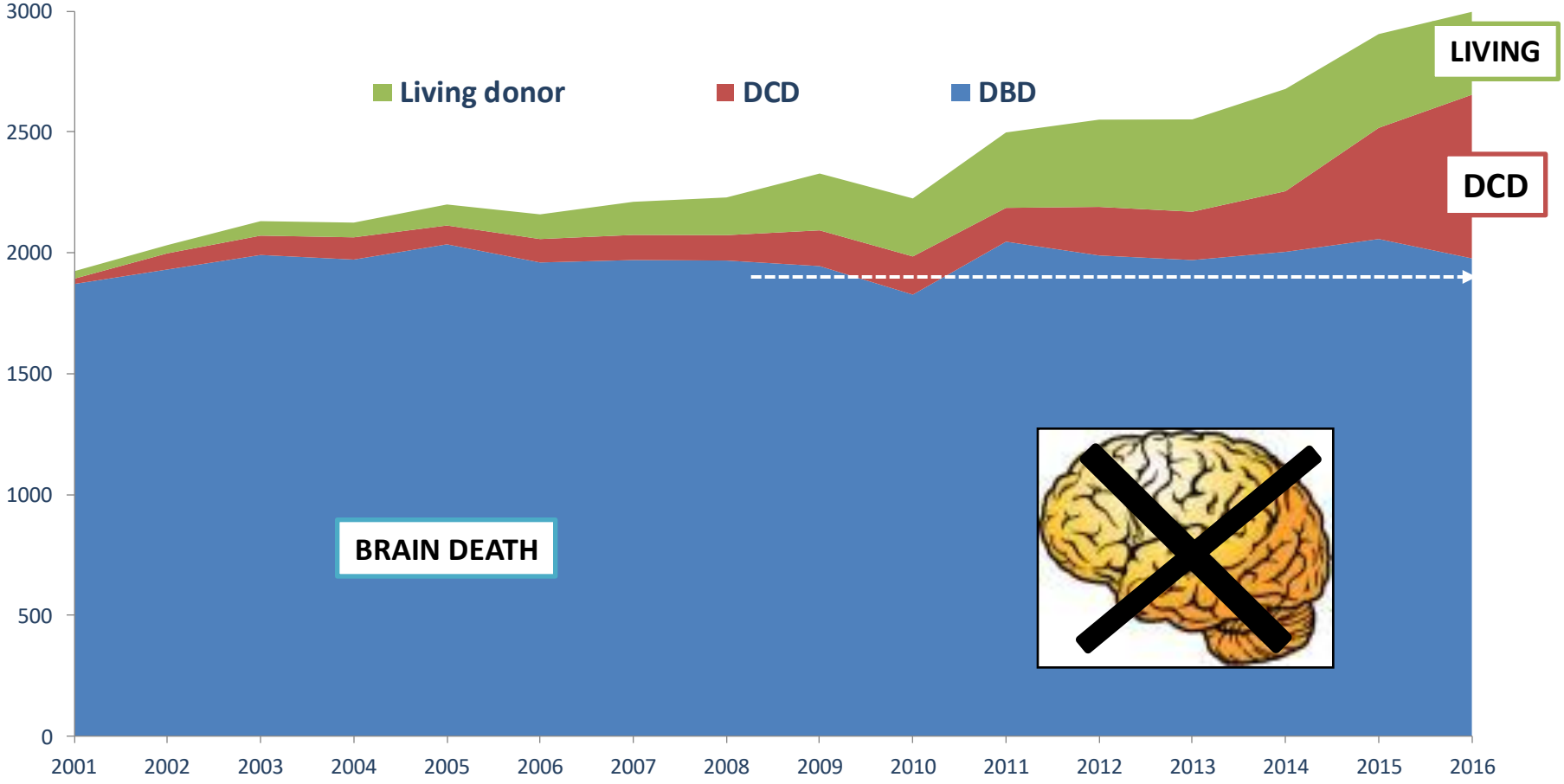
plan 40

- ✓ Information program to patients
- ✓ Information and training professionals
- ✓ Expand living donors pool: Crossover-Donor Kidney program, good samaritan

LIVING DONOR KIDNEY TRANSPLANTS



KIDNEY TX EVOLUTION IN SPAIN ACCODING TO DONOR TYPE



MINORITIES

OBJECTIVE: FULL INTEGRATION OF IMMIGRANTS AND MINORITIES TO DONATION AND TRANSPLANTATION

POBLATIONAL SURVEY: ATTITUDES OF IMMIGRANT POPULATION TOWARDS ORGAN DONATION

(in collaboration with Faculty of Psychology, Universidad Autónoma de Madrid)

- **Lack of information on donation and transplantation**
- **Family interview is essential**
- **Three collectives reluctant to donation:**

  North Africa

  Sub-Saharan Africa

  Asia

Clin Transplant 2012: 26: E200–E212 DOI: 10.1111/j.1399-0012.2011.01586.x

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Clinical Transplantation

Factors related to attitudes toward organ donation after death in the immigrant population in Spain

López JS, Valentín MO, Scandroglio B, Coll E, Martín MJ, Sagredo E, Martínez JM, Serna E, Matesanz R. Factors related to attitudes toward organ donation after death in the immigrant population in Spain.

Abstract: Considering the relevance of the migratory processes in Western societies, the attitudes toward organ donation after death are analyzed by means of a survey applied to a representative random sample of the resident immigrant population in Spain, comprising 1202 subjects (estimated margin of error of ±2.88%, p = q, p < 0.05). Considered variables were disposition toward own organ donation, disposition toward deceased relatives' donation in different situations, arguments against donation, socio-demographic indicators, religious beliefs, social integration, and information about organ donation and transplantation. Predisposition to donate varies strongly across geographical origin and religious beliefs and also shows relationships with additional socio-demographic, social integration, and informative variables. In turn, the relationship between religious beliefs and attitude toward donation varies as a function of the degree of social integration. In Spain, the immigrant population is a heterogeneous collective that requires differential strategies to promote donation. Such strategies should be aimed at reinforcing the existing positive attitudes of citizens from West Europe and Latin America, and at familiarizing and informing about donation in citizens from the East, and at making specific efforts to break down the cultural and religious barriers toward donation in African citizens, with special emphasis on people of the Muslim faith.

Jorge S. López[a], María O. Valentín[a], Barbara Scandroglio[a], Elisabeth Coll[b], María J. Martín[a], Encarnación Sagredo[b], José M. Martínez[a], Emilio Serna[b] and Rafael Matesanz[b]

[a]Departamento de Psicología Social y Metodología, Facultad de Psicología, Universidad Autónoma de Madrid, Ciudad Universitaria de Cantoblanco and [b]Medical Department, Organización Nacional de Trasplantes, Madrid, Spain

Key words: cultural diversity – immigrant population – organ donation – organ procurement – public attitudes

Corresponding author: Jorge S. López, Departamento de Psicología Social y Metodología, Facultad de Psicología, Universidad Autónoma de Madrid, Ciudad Universitaria de Cantoblanco, 28049 Madrid, Spain. Tel.: +34 914 978 584; fax: +34 914 975 215; e-mail: jorge.lopez@uam.es

Conflict of interest: The authors of this manuscript have no conflicts of interest to disclose.

Accepted for publication 17 November 2011

Specially for religious reasons- Muslims with strong religious beliefs.

STRATEGIES

- ✓ Information and awareness of donation and transplantation: *Donación sin fronteras* campaign, *En el lado de lado de la vida* (silent short film)
- ✓ Enhance collaboration between transplant network and cultural mediators (Symposium, workshops)
- ✓ Strengthen relations with the most representative social organizations of the different groups
  - Muslims
  - Gypsies

La solidaridad de los sabadellenses y del resto de la población catalana volvió a quedar patente el pasado año. El número de donaciones de órganos aumentó en Catalunya después de que 2006 hubiera experimentado un ligero retroceso. Además, por primera vez en años, las listas de espera de algunos trasplantes disminuyeron. En nuestra ciudad, la cifra de donaciones realizadas en el Hospital de Sabadell se mantuvo estable respecto a años anteriores.

Aumentan las donaciones de órganos entre el colectivo de los inmigrantes

La cifra de pacientes que las realizaron se mantiene en el Hospital de Sabadell

El Parc Taulí es uno de los centros extractores de órganos autorizados en Catalunya

O.J.D.: 15556
E.G.M.: No hay datos

ABC Comunidad Valenciana

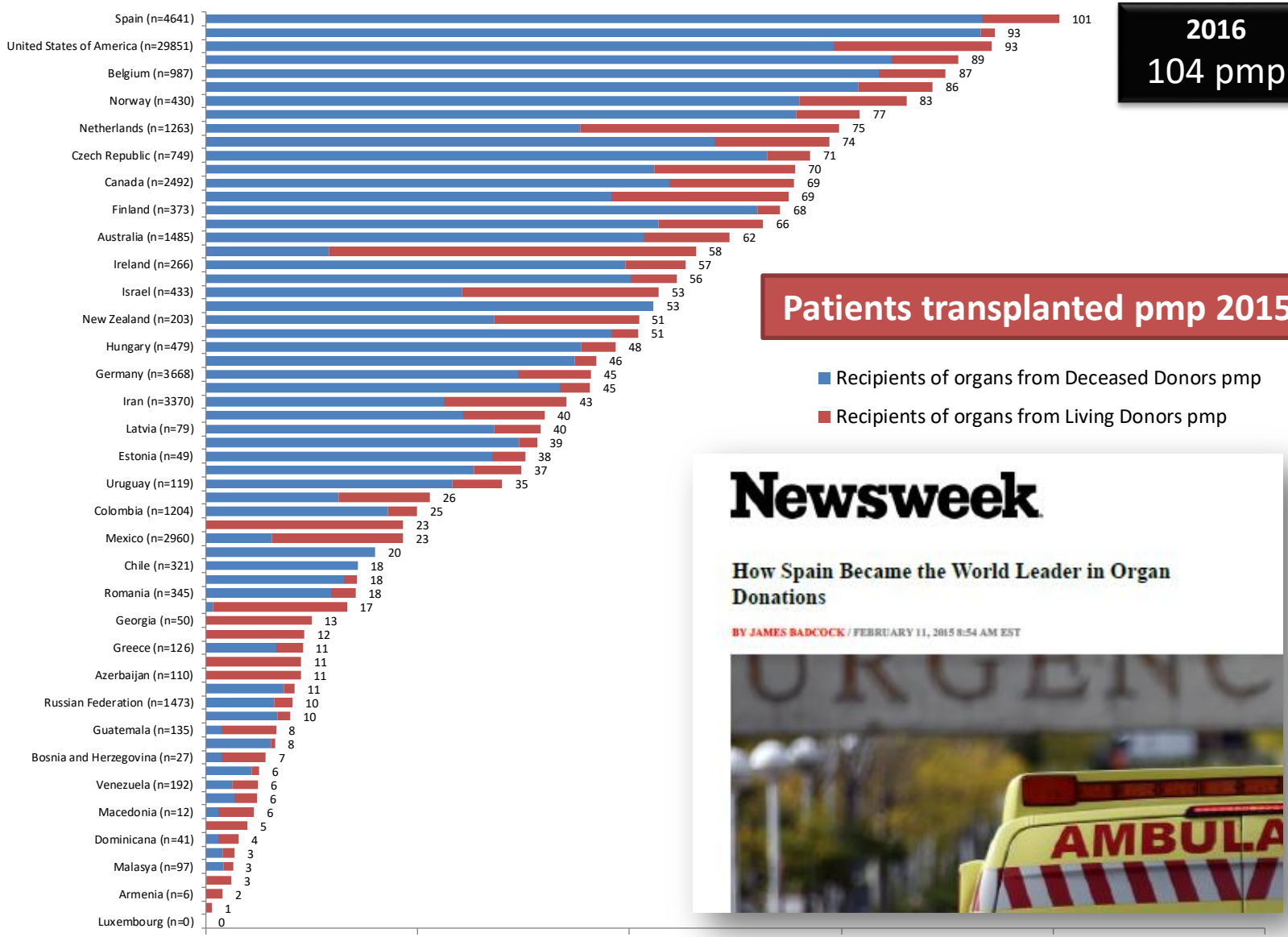
Fecha: 13/
Sección: CO
Páginas: 9

Alicante reduce hasta el 6% el rechazo de los extranjeros a donar sus órganos

La figura del mediador lingüístico en el Hospital General arrancó hace cuatro años, cuando la negativa a la donación era de un 40%

2016
104 pmp

Patients transplanted pmp 2015



American Journal of Transplantation 2016; XX: 1–8
Wiley Periodicals Inc.

doi: 10.1111/ajt.14104

Minireview

How Spain Reached 40 Deceased Organ Donors per Million Population

R. Matesanz, B. Domínguez-Gil*, E. Coll, B. Mahillo and R. Marazuela

Organización Nacional de Trasplantes, Madrid, Spain
**Corresponding author: Beatriz Domínguez-Gil, bdominguez@msssi.es*

With 40 donors and more than 100 transplant procedures per million population in 2015, Spain holds a privileged position worldwide in providing transplant services to its patient population. The Spanish success derives from a specific organizational approach to ensure the systematic identification of opportunities for organ donation and their transition to actual donation and to promote public support for the donation of organs after death. The Spanish results are to be highlighted in the context of the dramatic decline in the incidence of brain death and the changes in end-of-life care practices in the country since the beginning of the century. This prompted the system to conceive the 40 donors per million population plan, with three specific objectives: (i) promoting the identification and early referral of possible organ donors from outside of the intensive care unit to consider elective non-therapeutic intensive care and incorporate the option of organ donation into end-of-life care; (ii) facilitating the use of organs from expanded criteria and non–standard risk donors; and (iii) developing the framework for the practice of donation after circulatory death. This article describes the actions undertaken and their impact on donation and transplantation activities.

Abbreviations: cDCD, controlled donation after circulatory death; DBD, donation after brain death; DCD, donation after circulatory death; ICU, intensive care unit; ONT, Organización Nacional de Trasplantes; pmp, per million population; uDCD, uncontrolled donation after circulatory death; WLST, withdrawal of life-sustaining therapy

Received 12 September 2016, revised 17 October 2016 and accepted for publication 28 October 2016

Introduction

Transplantation is the best and, frequently, the only life-saving treatment for end-stage organ failure. In 2014, 119 873 solid organ transplantations were performed worldwide (WHO Global Observatory on Organ Donation and Transplantation (1)). Although impressive, the annual number of organ transplants represents less than 10% of the global needs. Organ shortage leads to deaths and poor quality of life for those on the waiting list. Moreover, because the costs of renal replacement therapy with dialysis greatly surpass those of kidney transplantation after the first year, organ shortage implies important costs to healthcare systems. The benefits of transplantation have also been marred by the growing phenomenon of organ trafficking and transplant tourism, practices that violate fundamental human rights and threaten individual and public health.

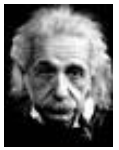
The World Health Assembly, concerned by the growing demand for organs and exploitative actions against the destitute and vulnerable, urged member states "to strengthen national and multinational authorities and/or capacities to provide oversight, organization and coordination of donation and transplantation activities, with special attention to maximizing donation from deceased donors" (2). Anticipating a call that the World Health Organization would launch 20 years later, the Spanish Ministry of Health created the Organización Nacional de Trasplantes (ONT) in 1989 as an agency in charge of the coordination and oversight of donation, procurement, and transplantation activities in a politically decentralized country, albeit with an adequate legislative and technical framework from the transplantation perspective. The ONT conceived an organized and professionalized model to effectively identify donation opportunities and facilitate their transition to actual donation and to promote public support for donation after death (3). The elements of the Spanish model, extensively described in literature, made Spain double its deceased donation activity in less than a decade (Figure 1) and soon hold a privileged position worldwide that it maintains (4–6).

In 2008, Spain was confronted with important epidemiological events and changes in end-of-life care practices that challenged the progress of the country toward self-sufficiency in transplantation (7). The ONT then designed the 40 donors per million population (pmp) plan (8). The aims of this report are to summarize the challenges that the system has faced in further developing donation from the deceased and to describe the three strategies that have made Spain reach the target of 40 donors pmp

THANK YOU VERY MUCH FOR YOUR ATTENTION

ecoll@msssi.es

'Nothing happens until something moves'
— Albert Einstein



'To improve is to change;
to be perfect is to change often'
— Winston Churchill