# Blurring the line between Marriage and De Facto: evidence from Australia

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#### MOTIVATION

- ► Marriage has been at the core of our Western civilisation for centuries
- ► The State has for long promoted it: religious before, secular after
- ▶ In AU, until recently: "a union for life" (Hyde v. Hyde and Woodmansee, 1866)
- ► Today more liberal stance: "maintaining an evidentiary record of relationships" Parkinson (2016)
- ► Lawmakers' concerns: protection of vulnerable party, fair allocations

#### MOTIVATION

Introduction 0000

> ▶ Important to study the effects of reforms changing the nature and incentives of long term relationships

▶ The stability of those are in the interest of the children involved

▶ Understanding the impact of changes in the family law can help drafting future welfare-improving policies

#### EXECUTIVE SUMMARY

Introduction 0000

- ▶ How does giving de facto couples marriage-like rights change their duration?
- Does it change the probability of being in one?
- ▶ Identification through exogenous change in law over time
- ▶ The 2008 reform gives De Facto couples same rights wrt married (Comm.)
- ► Long term relationships (unions) last longer
- Effect driven by migration from de facto to marriage
- ▶ Interaction with culture: immigrants almost unaffected
- ► Mechanism: aversion to uncertainty

### 2008'S AMENDMENT TO THE FAMILY LAW ACT

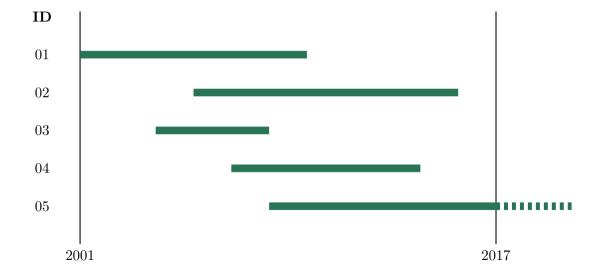
► Family Law Act 1975 until No 115, 2008

Introduction 0000

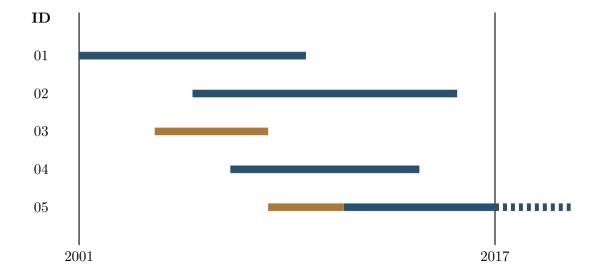
- ▶ Extended the NSW De Facto Relationship Act (1984) to the rest of AUS
- De facto and same-sex relationships fell out of Commonwealth's jurisdiction
- De facto  $\equiv$  "a couple living together on a genuine domestic basis"
- Criteria include existence of a sexual relationship, offspring and shared ownership
- ► This ill-defined definition makes one's marital status uncertain
  - $\rightarrow$  ambiguity aversion
- De facto defined ex-post, marriage ex-ante (no ambiguity)

- ▶ Household, Income and Labour Dynamics in Australia
- ▶ following lives of more than 17,000 Australians each year
- ▶ 17 years (2001-2017), 17 waves
- ► Sample representative of the country's population
- ► Variables on econ, psy and family dynamics
- ▶ Duration-model sample: 32,800 obs, 7,257 individuals

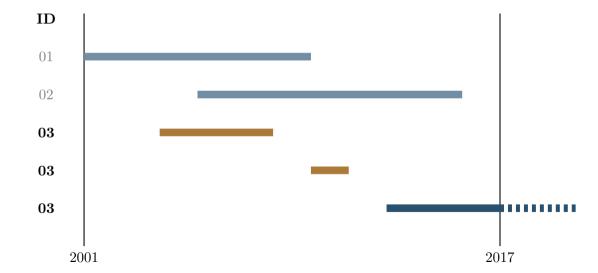
### SAMPLE CONSTRUCTION



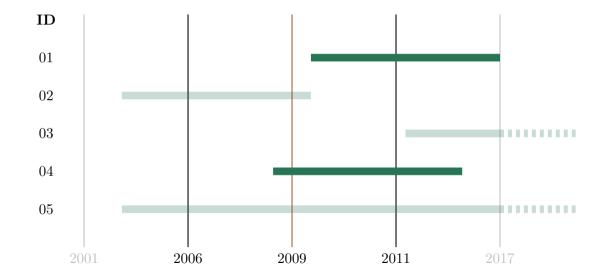
### SAMPLE CONSTRUCTION



### SAMPLE CONSTRUCTION



### SAMPLE CONSTRUCTION: RESTRICTING THE SAMPLE



### DESCRIPTIVES

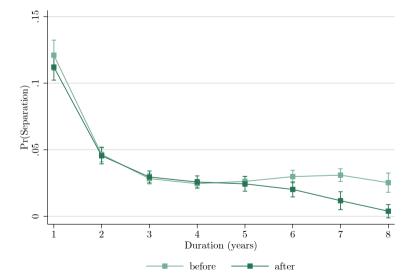
mean	$\operatorname{sd}$
	su
1962.61	12.39
0.50	0.78
0.15	0.35
5.80	2.79
5.29	2.64
1.87	0.34
166142	
	1962.61 0.50 0.15 5.80 5.29 1.87

#### DURATION MODEL: HAZARD

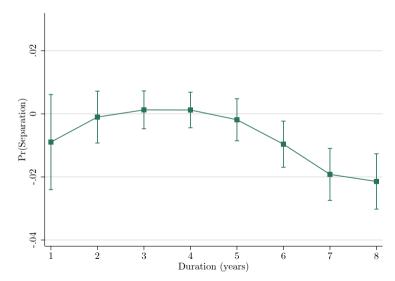
$$logit \ Pr[S_{i+1} = 1 | S_i = 0, X] = \alpha_0(j) + \alpha_1(j)D + \beta X$$
 (1)

- $\triangleright$  S = 1 if the union ended in a separation at time i
- ► Flexible specification:  $\alpha_i(j) \equiv \gamma_{0i} + \gamma_{1i}j + \gamma_{2i}j^2 + \gamma_{3i}j^3$
- $\triangleright$  D = 1 if the union started after 2008, 0 otherwise
- ► S.e. clustered at individual level
- ► X includes birth cohort only, until otherwise specified

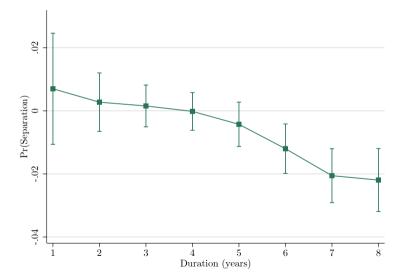
### HAZARD CURVES (2001-2017)



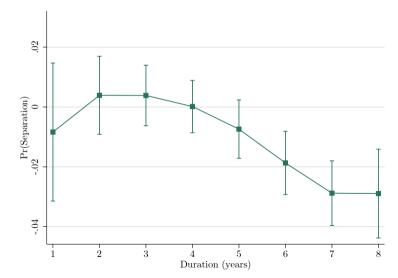
### DIFFERENCE BETWEEN HAZARD CURVES (2001-2017)



### DIFFERENCE BETWEEN HAZARD CURVES (2003-2014)



### DIFFERENCE BETWEEN HAZARD CURVES (2006-2011)

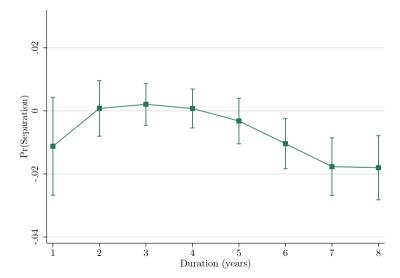


### HAZARD CURVES WITH DETERMINANTS

The following categorical covariates are included:

- ► Remoteness of Area (ASGS 2011)
- ► Country of birth (brief)
- Decile of Index of relative socio-economic disadvantage (SEIFA 2001)
- ► Highest education level achieved
- Parents divorced

#### DIFFERENCE BETWEEN HAZARD CURVES WITH DETERMINANTS

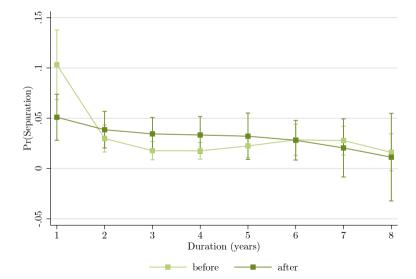


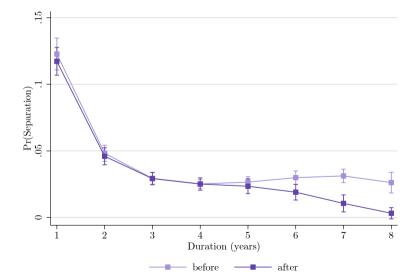
## Econometric model: hazard for non-English-speaking (ES)

$$logit Pr[S_{j+1} = 1 | S_j = 0, X] = \alpha_0(j) + \alpha_1(j)\overline{ES} + \alpha_2(j)(D) + \alpha_3(j)(D \times \overline{ES}) + \beta_2 X$$
(2)

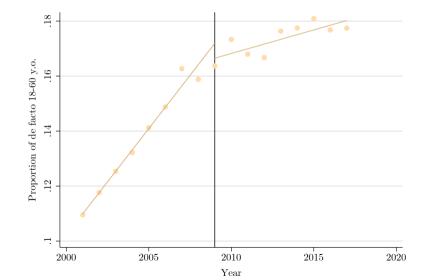
- $ightharpoonup \overline{ES} = 1$  for those not born in a main English-speaking country, 0 otherwise
- $\triangleright$  S = 1 if the union ended in a separation at duration i
- ► Flexible specification:  $\alpha_i(i) \equiv \gamma_{0i} + \gamma_{1i}i + \gamma_{2i}i^2 + \gamma_{3i}i^3$
- D=1 if the union started after 2008, 0 otherwise
- ► S.e. clustered at individual level
- X includes the whole set of covariates

#### HAZARD CURVES FOR NON-ENGLISH-SPEAKING

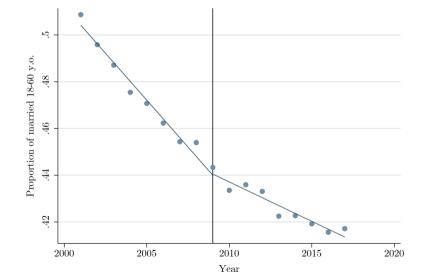




Empirical Analysis



### IT SEEMS TO BE THE CASE



### ECONOMETRIC MODEL: PROB(Y)

$$Y_{u,t} = \theta_0 + \theta_1 T_t + \theta_2 D_t + \theta_3 (D_t \times T_t) + \theta_4 X_{u,t} + \epsilon_{u,t}$$
(3)

- $ightharpoonup Y := \{married, defacto, union\} \rightarrow \text{binary variables}$
- $\triangleright$   $Y_u = 1$  if individual u's marital status is married/defacto/union at time t, 0 otherwise
- ► Sample of of individuals 16-60 years old
- ► S.e. clustered at individual level

$\begin{array}{cccc} T & 0.003^{***} \\ & (0.001) \\ \tilde{D} & -0.003 \\ & (0.004) \\ \\ \tilde{D} \times T & -0.005^{***} \\ & (0.001) \\ \\ \text{Birth cohort} & 0.005^{***} \\ & (0.000) \\ \\ \text{Constant} & -9.125^{***} \\ & (0.333) \\ \\ \text{No. of Obs.} & 138329 \\ \\ \end{array}$		Defacto
$\begin{array}{ccc} \tilde{D} & -0.003 \\ & (0.004) \\ \\ \tilde{D} \times \text{T} & -0.005^{***} \\ & (0.001) \\ \\ \text{Birth cohort} & 0.005^{***} \\ & (0.000) \\ \\ \text{Constant} & -9.125^{***} \\ & (0.333) \\ \\ \end{array}$	T	0.003***
$\begin{array}{c} \tilde{D} \times T & (0.004) \\ \tilde{D} \times T & -0.005^{***} \\ \hline (0.001) \\ \text{Birth cohort} & 0.005^{***} \\ \hline (0.000) \\ \text{Constant} & -9.125^{***} \\ \hline (0.333) \\ \end{array}$		(0.001)
$ ilde{D}  imes  ext{T}                                    $	$ ilde{D}$	-0.003
$\begin{array}{c} & & & & \\ & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & \\ & & & \\ & &$		(0.004)
Birth cohort 0.005*** (0.000)  Constant -9.125*** (0.333)	$\tilde{D} \times \mathrm{T}$	-0.005***
Constant $(0.000)$ $-9.125***$ $(0.333)$		(0.001)
Constant -9.125*** (0.333)	Birth cohort	0.005***
(0.333)		(0.000)
	Constant	-9.125***
No. of Obs. 138329		(0.333)
	No. of Obs.	138329

t-statistics in parentheses \*\*\* p<0.01; \*\* p<0.05; \* p<0.10.

Empirical Analysis

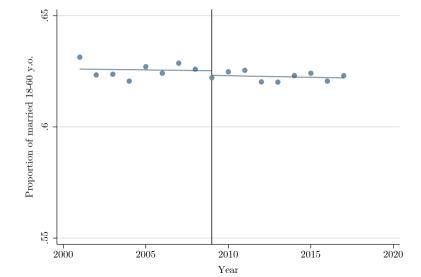
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	Married	
T	0.005***	
	(0.001)	
$ ilde{D}$	0.011**	
	(0.004)	
$\tilde{D} \times \mathrm{T}$	0.005***	
	(0.001)	
Birth cohort	-0.014***	
	(0.000)	
Constant	27.879***	
	(0.481)	
No. of Obs.	138329	
t-statistics in par	t-statistics in parentheses	

\*\*\* p<0.01; \*\* p<0.05; \* p<0.10.

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#### THESE EFFECTS CANCEL OUT



### Probability of being in a union

	Union		
Т	0.009***		
	(0.001)		
$ ilde{D}$	0.008*		
	(0.005)		
$\tilde{D} \times \mathrm{T}$	-0.000		
	(0.001)		
Birth cohort	-0.009***		
	(0.000)		
Constant	18.754***		
	(0.488)		
No. of Obs.	138329		
t-statistics in par	t-statistics in parentheses		

\*\*\* p<0.01; \*\* p<0.05; \* p<0.10.

Empirical Analysis

TInion

#### CONCLUSION

- ▶ It seems at first that empowering de facto relationships hampers their rise
- $\blacktriangleright$  However, the how (\frac{1}{2}uncertainty) is likely to be the actual cause
- Aversion to ambiguity in marital status might lead to shift to marriage
- Marriage, in which commitment is declared upfront, leads to  $\uparrow$  duration
- Given the lawmaker's concerns over children welfare, there lies the next step