## **Australian Studies of Psychiatric Observation Units**

		Unit Name,	No. of	LOS Goal				Presenting		ED LOS Pre	ED LOS Post	Readmission		
Study Brakoulias	Study Type Retrospective	Hospital, Type PECC; Nepean	Beds 4	(h)	LOS Actual Not stated	Male, % 45.5	Age, y	Complaint Suicidal ideation:	Diagnostic Profile  Adjustment disorder:	(h:min)	(h:min)  Not stated	Rate Not stated	Use of Restraint Reduced	Other
et al, 2010 <sup>43</sup>	case control	Hospital; public sector, urban hospital with strong university affiliations					(SD=13.94)	47.6% Intoxication: 22.6% Suicide attempt: 24.5% Depression: 20.2%	36% Depression: 25%, psychosis (including schizophrenia): 22.9%	stated			requirement for physical restraint, states halved	
Brakoulias et al, 2013 <sup>41</sup>	Retrospective	PECC; Nepean Hospital; public sector, urban hospital with strong university affiliations	4	48	12–24 h: 58.7% 24–48 h: 27.2%	Not stated	Not stated	Not stated	Not stated	Not stated	Not stated	Not stated	Not stated	Medical complications while in PECC increased LOS
Browne et al, 2011 <sup>45</sup>	Retrospective case control	PAPU; Royal Melbourne Hospital; public sector, urban hospital with strong university affiliations	4	48	Not stated	Not stated	Not stated	Not stated	Not stated	Not stated	Reduced stays in ED > 24 h Improved 8-hour admission rate	Not stated	Patients requiring restraint: 38 pre, 17 post Time spent restrained: 6.8 h pre to 2.5 h post	
Huber et al, 2021 <sup>44</sup>	Retrospective case series	PECC; St Vincent's Hospital; public sector, urban hospital with strong university affiliations	6	48	Not stated	63	36.5 (mean) (range, 13–92)	Suicidality: 52% Psychotic: 22%	Increase in admission of patients with suicidal ideation	13:00	8:00	Not stated	Not stated	Increase in patients with psychotic symptoms admitted to acute inpatient ward Increase in ED MH presentations over 10 y Intoxication is a barrier
Kealy- Bateman et al, 2019 <sup>40</sup>	Retrospective	SSU; Royal Prince Alfred Hospital; public sector, urban hospital with strong university affiliations	6	72	3 days (SD = 2.4)	39	Not stated	Not stated	Personality disorders and acute stress reactions: 34% Intoxication: 18%	Not stated	Not stated	20% at 28 days	Not stated	Involuntary admissions: 20%
Mitchell et al, 2020 <sup>39</sup>		PAPU; Austin Health, Peninsula Health, Eastern Health; public sector, urban hospitals with strong university affiliations	4, 6, and 4	72	1.5 days (mean)	38.5	36.7 (mean) 16–25: 43% 26–35: 19.8% 36–45: 16.4% 46–55: 15.5% 56–65: 4.5% > 66: 9.3%	Not stated	BPD: 20.7% Depression: 18.2% Adjustment disorder: 16.7%	5:05	5:57	11.3% at 28 days	Not stated	1 site improved ED flow, 2 sites worsened ED flow Increase in MH presentations across all sites
Seymour et al, 2020 <sup>42</sup>	Retrospective case series	PECC; Nepean Hospital; public sector, urban hospital with strong university affiliations	4	48	LOS decreased from original study in 2007		2007: 35 2015: 36.1 (mean)	Suicidal ideation 2007: 47% 2015: 41.2% Suicide attempt 2007: 25.4% 2015: 25.5% Depression 2007: 22.9% 2015: 7.2%	Adjustment disorders 2007: 32.5%, 2015: 10.9% Depression 2007: 28.8%, 2015: 30.3% Substance abuse/ dependence 2007: 18.7% 2015: 12.2% Borderline personality disorder 2007: 9.6%, 2015: 13.6%	Not stated	Not stated	Not stated	Significant reduction in use of chemical restraint within the PECC over time	
Braitberg et al, 2018 <sup>37</sup>	Pre- and post- intervention retrospective case control	BAU; Royal Melbourne Hospital; public sector, urban hospital with strong university affiliations	6	24	Not stated	Not stated	Not stated	Not stated	Not stated	7:03 (SD=4:25)	3:30 (SD = 2:59)	Not stated	Code gray: 17.7% pre, 14.7% post Mechanical restraint: 9.0% pre, 6.6% post Therapeutic sedation: 8.2% pre, 6.6% post	72,389 ED presentations, 3,259 admitted to BAU (12 months)
Daniel et al, 2021 <sup>38</sup>	Prospective observational	BAU; Royal Melbourne Hospital; public sector, urban hospital with strong university affiliations	6	24	12.7 h (median MH patients) IQR = 5.6–19.7 5.2 h (median, NMH patients) IQR = 2.7–13.0	61.15%	35 (mean) (range, 18–76)	Not stated	Psychiatric diagnosis: 49% Intoxication: 32% Psychosocial crisis: 11% Medical: 8%	Not stated	2:36	Not stated	8.5%	Few established care plans despite repeat ED MH presentations Involuntary: 21%

Abbreviations: BAU = behavioral assessment unit, ED = emergency department, IQR = interquartile range, LOS = length of stay, MH = mental health, NMH = non - mental health, PAPU = psychiatric assessment and planning unit, PECC = psychiatric emergency care center, SSU = short stay unit.