

Electronic Handover

A working example

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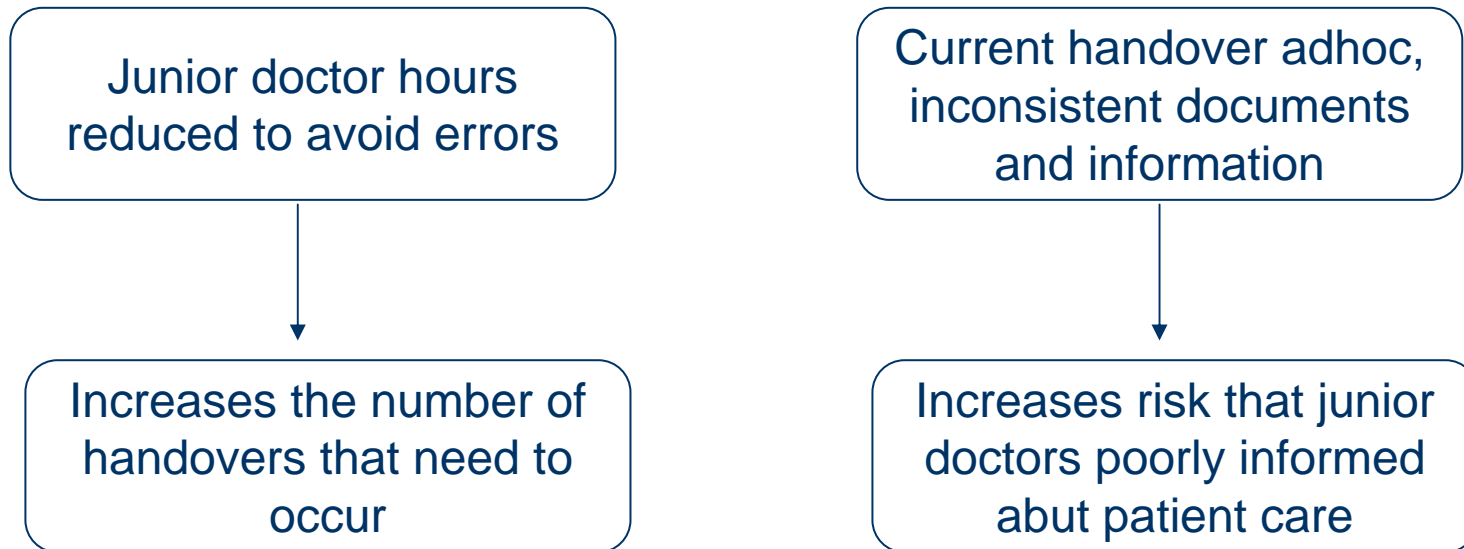
Geelong Australia

- Town population 180,000
- Catchment population 270,000
- Referral base 400,000
- Growth rate 3%
- 3500+ employees
- >45000 inpatient visits
- Similar number also in ED and outpatient visits

Today's Presentation

- Why we need handover
- What we studied
- How we use it today

Background



- Quality and Safety committee recognised recent near misses and 1 patient death due to poor handover

Background

- Tight health IT budgets in Australia
 - Banks 10%
 - Private companies 5-6%
 - Barwon Health 1%
 - AUD 3.7 m (US 2.9 m)

Background

- Junior doctors need to have patient lists which accurately identify
 - Where patients are located
 - Working Dx
 - What work needs to be done
 - Recent lab tests



Why we need handover?

Setting the scene

- It's 2am
- You're the night RMO
- Three wards are calling:
- "I have a 50yo with chest pain please review"
- "I have a 75yo man post op who has poor urine output"
- "I have a 20yo with cough that's keeping them awake – please review them asap"

Common issues

- Who should you review first?
- How do you know how urgent any of these problems are?
- A handover allows you to better “triage” your workload

Handover Notes Received

- The 50 yo is admitted for cellulitis, known to have ischaemic heart disease, has been unwell during day
- The 75yo has chronic renal failure (and always has low urine output)
- The 20yo has a known intractable cough

Important Concept

- Expected unwell
- Unexpected unwell

Concept Demonstrated

- Our 50yo patient is EXPECTED unwell, and has also been verbally handed over so you've been anticipating the call
- The other two you're relying on the electronic notes (UNEXPECTED unwell) because you weren't given a verbal handover

Evolving the Electronic Handover Concept

- How does the workflow / demand change from shift to shift?
- One of the key concepts to any handover

Day Doctors (27)	Evening Doctors (4)	Night Doctors (2)
Med Intern 1 Med Intern 2 Med Intern 3 Med Intern 4 Med Intern 5 Short Stay Unit Resident	Evening Medical Cover Intern	Night Medical Resident
Cardiology Resident 1 Cardiology Resident 2 Cardiology Resident 3 Neurology Resident Gastroenterology Renal Resident	Evening Specialities Cover Resident	
Paediatrics Resident 1 Paediatrics Resident 2 Oncology Resident 1 Oncology Resident 2 Psychiatry Resident 1 Psychiatry Resident 2	Paediatrics/Oncology/Psych Resident	
Medical Registrar 1 Medical Registrar 2 Medical Registrar 3 Medical Registrar 4 Medical Registrar 5 Renal Registrar Gastroenterology Registrar Infectious Diseases Registrar Neurology Registrar Stroke Registrar	Medical Registrar (Cover)	Night Medical Registrar

Electronic Handover Concept

- Clearly, handover of 200 patients is not feasible in the available time
- There needs to be some available time (but not for 200 patients!)
- A system is needed to support effective and accurate handover



What we studied

Electronic medical handover: towards safer medical care

MJA 2005; 183: 369–372

Lean-Peng Cheah

James Pollard

Debbie H Amott

David A K Watters

Handover Case Study

- Before we went forward, we had to know where we'd been
- How did we appraise our previous performance?

Weekend February 2005

Work

45 patients to review in 5 wards

4 Non-operated admissions, 10 ED consults

1 consult (Surgery booked for Tuesday)

Two emergency theatre cases for on call unit

Two multi-traumas

Events

Haematemesis requiring Gastroscopy – another unit

15 Discharges

No deaths

Key Questions: 1

How many patients does the covering registrar need to see?¹

	Av	Range
Total patients (5 General Surgical Units)	38	23 - 50
No handover	8	3 - 18

1. Retrospective review of 25 handover sheets

Key Questions: 2

How long did it take and did it provide the right information?

Time taken to complete unit handover	9.8min
Handover list help locate patients efficiently	100%
Data in handover sheet help identify what was wrong with patient	71%
Handover data helped identify decisions that had to be made in ward rounds	57%
Data helped remind of key investigations to do /results to be reviewed	85%
Information adequate to know which tests to order for the weekend	71%
Adequate information about consultants' availability over weekend	41%
Handover data updated over the weekend for handback	50%
Handback data identified significant events that happened while offduty	53%

Friday Handover

10 mins per unit

1

2

3

4

5

Average 7-8 patients

**On-Call
Weekend
or Public
Holiday**

Average 35-40 pts

Monday Handback

2mins per event

1

2

3

4

5

*Average 2 discharges
0-1 event per unit*

The Starting Point

Handover: Pretty Good

Performance: Some frustrations

Handback: Inconsistent



2000 10 30



Implementation of Electronic Handover

Ward Heath Wing Level 4 1 patient

1	Joseph	Day 144	916 88 yrs	10/11 7:35	10/11 7:35	12/11 9:55
				INR 1.3	Na 145	Hb 146
2					K 4.6	
3					Creat 141	
4					Ur 13.8	

Ward Heath Wing Level 5 (continued next page)

5	Michael	Day 524	973 31 yrs			

6	Smith	Day 167	926 78 yrs	23/10 8:10	23/10 8:10	23/10 8:10
				Ca 2.09	Na 141	Hb 109
7				PO4 1.22	K 4.6	PI 489
8					Creat 79	WCC 9.1
9					Ur 4.6	Neu 5.52

10	Smith	Day 169	944 60 yrs			
				18/11 8:40	18/11 8:40	
11				Na 138	Hb 100	
12				K 3.7	PI 153	
13				Creat 74	WCC 7.2	
14				Ur 4.0	Neu 5.00	

15	Lesley	Day 444	1935 69 yrs			

16	Smith	Day 181	911 93 yrs	3/11 10:20	5/11 8:30	5/11 8:30
				INR 1.1	Na 138	Hb 80
17				APTT 26	K 5.4	PI 103
18					Creat 265	WCC 10.7
19				3/11 10:20	Ur 21.3	Neu 8.65
20				TropI < 0.10		

21	Smith	Day 110	1927 77 yrs			

22	Dobson	Day 105	1943 61 yrs	Consultant (Brown, G) IS available Requires Review: No		29/10 8:50	29/10 8:50
				Follow Up: CBE, XM		Na 132	Hb 133
23				W/E plan: Patient is ready for discharge		K 3.7	PI 220
24					Creat 60	WCC 9.9	
25					Ur 2.8	Neu 8.66	

26	Smith	Day 569	1909 95 yrs	Lives with daughter. Probably for ACAT.		8/11 15:45	23/12 9:15	23/12 9:15	23/12 9:15
						INR 1.5	Ca 2.29	Na 139	Hb 121
27						APTT 38	PO4 1.12	K 3.6	PI 231
28								Creat 91	WCC 9.3
29								Ur 6.0	Neu 7.59
30						30/11 7:00	8/12 8:05		
31						TropI < 0.10	CRP 107		

32				umerus - C&C					
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<p>Gloria Dawn White, R Day 20 DOB 28/1/1934 70 yo s/Pancreatitis, resolving</p>	<p>Back onto warfarin (INR 2 yeast). Had hematemesis last wk. OK now. Pls check INR levels (aiming 2-3 as Hx AVR/MVR).</p>	<p>25/2 8:00 Ca 2.24 PO4 1.23</p> <p>24/2 8:00 Anyca 23 Uptac 272</p>	<p>Froth 67 Abini36 Bil 12 ALT 58 AST 33 INR 2.8 ALP 90 APTT 31 GGT 35</p>	<p>25/27:35 Na 139 K 4.9 Urea 6.8 Creat 90 Net 2.66 WCC 5.0 Neu 152.5 CRP 15</p>
<p>Frank Hendrick Jeffernan, E Day 16 DOB 26/3/1936 68 yo</p>	<p>neurotic bowel, immunosuppressed, initial primary anastomosis leaked, now Hartmann's. progressing well, now tolerating diet, awaiting rehab.</p>	<p>22/2 8:30 Ca 3.05 PO4 0.89</p> <p>15/2 5:00 Anyca 23 Uptac 98</p> <p>21/2 6:05 INR 1.1 ALP 85 APTT 24</p>	<p>Proth 51 Album121 Bil 7 ALT 32 AST 30 INR 1.1 ALP 85 GGT 141</p>	<p>21/2 6:25 Na 138 K 4.3 Urea 3.6 Creat 92 Net 3.81 WCC 7.3 Neu 212.6 CRP 29</p>
<p>Michael Kevin Curley, J Day 8 DOB 21/7/1984 20 yo</p>	<p>? Non rotation. Ongoing abdo pain. Not unwell. Observe. Daily bloods. Not for IV narcotics. For exploratory laparotomy monday on elective pm list.</p>	<p>25/2 4:00 Ca 1.93 PO4 0.89</p> <p>24/2 6:30 Anyca 23 Uptac 84</p>	<p>Froth 68 Abini38 Bil 11 ALT 107 AST 87 INR 1.0 ALP 90 GGT 123</p>	<p>25/27:25 Na 141 K 4.4 Urea 2.9 Creat 109 Net 2.06 WCC 4.9 Neu 212 CRP 1.0</p>
<p>Lucretia Lorraine Curley, J Day 8 DOB 18/2/1951 53 yo</p>	<p>Right hemi Thu Triple AB's. Aggressive chest physio and regular ventolin. Sips and ice for now. SUN: episode of APO. Lasix given.</p>	<p>25/2 4:00 Ca 1.93 PO4 0.89</p> <p>24/2 6:30 Anyca 23 Uptac 84</p> <p>22/27:50 INR 1.3 ALP 222 APTT 32</p>	<p>Proth 50 Album113 Bil 5.5 ALT 15 AST 57 INR 1.3 ALP 222 GGT 115</p>	<p>21/27:35 Na 139 K 3.4 Urea 1.4 Creat 44 Net 5.15 WCC 7.5 Neu 212 CRP 285</p>
<p>Raymond John Watters, D Day 7 DOB 10/3/1938 66 yo</p>	<p>Metastatic colon Ca. Left hemicolectomy 24/2, uncomplicated. Check to ensure analgesia OK, chest physio and mobilising. SUN:pt well. bloods improving.</p>	<p>25/2 10:30 Ca 2.31 PO4 1.26</p> <p>23/27:30 INR 1.1 ALP 254 APTT 27</p>	<p>Froth 67 Album127 Bil 12 ALT 37 AST 52 INR 1.1 ALP 254 GGT 437</p>	<p>25/27:40 Na 138 K 4.5 Urea 3.5 Creat 81 Net 6.18 WCC 10.1 Neu 212</p>
<p>Helen Jean White, R Day 6 DOB 22/1/1933 71 yo</p>	<p>Collection is draining rectally. Is stable. On IV ABs. SUN: bloods normal</p>	<p>24/2 6:00 Ca 2.15 PO4 1.19</p> <p>5/2 4:10 INR 1.1 ALP 130 APTT 32</p>	<p>Froth 70 Abini35 Bil 12 ALT 15 AST 15 INR 1.1 ALP 130 GGT 22</p>	<p>21/27:50 Na 140 K 4.2 Urea 3.2 Creat 61 Net 2.98 WCC 5.1 Neu 212 CRP 22</p>
<p>Mary Adelaide Rowley, S Day 6 DOB 6/1/1917 87 yo</p>		<p>15/2 6:50 Anyca 30 Uptac 143</p>	<p>Proth 54 Album127 Bil 5 ALT 13 AST 15 ALP 67 GGT 15</p>	<p>21/27:40 Na 140 K 3.5 Urea 3.2 Creat 15 Net 3.88 WCC 6.5 Neu 212 CRP 34</p>
<p>Michael Mitchell, G Day 6 DOB 20/12/1983 21 yo</p>	<p>Probable chrohn's disease. Check Hb sat (form in). Is on fluids. Possibly having colonoscopy on Monday under Mitchell (if so will need bowel prep written for sun pm pls)</p>	<p>23/27:15 Anyca 14</p> <p>21/2 6:10 INR 1.2 ALP 43 APTT 27</p>	<p>Proth 54 Album124 Bil 22 ALT 17 AST 18 INR 1.2 ALP 43 GGT 5</p>	<p>21/2 6:10 Na 139 K 3.4 Urea 1.7 Creat 95 Net 6.21 WCC 9.0 Neu 212 CRP 10</p>
<p>Eustace Frederick Jeffernan, E Day 5 DOB 15/3/1942 62 yo</p>	<p>Large mesh midline incisional hernia repair 24/2. DA x2 to stay in over WVE. Progress oral intake, make sure mobilising.</p>			<p>25/27:50 Na 136 K 4.0 Urea 3.5 Creat 80 Net 6.08 WCC 8.0 Neu 212</p>
<p>Cathryn Rowley, S Day 5 DOB 3/1/1960 44 yo</p>		<p>24/2 6:55 Anyca 28 Uptac 166</p>	<p>Froth 73 Abini39 Bil 29 ALT 15 AST 14 ALP 86 GGT 9</p>	<p>24/2 6:55 Na 131 K 3.7 Urea 5.5 Creat 87 Net 10.66 WCC 12.1 Neu 212 CRP 153</p>
<p>Douglas Horne, M Day 4 DOB 7/2/1949 55 yo</p>	<p>High anterior resection 25/2, uncomplicated. Likely ice/sips only over WVE. Check analgesia/ chest etc SUN: WCC sat!! Septic workup.</p>	<p>15/2 6:30 INR 1.0</p>	<p>Froth 75 Abini33 Bil 9 ALT 20 AST 25 INR 1.0 ALP 124</p>	<p>24/2 8:00 Na 138 K 5.4 Urea 4.3 Creat 91 Net 10.64 WCC 21.7 Neu 212</p>

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10:00 AM

Metastatic CA of unknown primary	INR 1.3 APTT 29	ALP 88 GGT 67	142 15:45 CRP 283
Terrence Michael 240008 White, R Day 6 DOB 19/5/1950 54 yo Open Appendectomy 16/2	May go onto FWD sat. IVABs tomorrow, then cease. DT still in as draining fair amount. Maybe out Sunday.	2/27/20 Na 140 K 3.5 Urea 4.9 Creat 86	2/27/20 Hb 135 Plt 310 WCC 14.6 Neu 12.15 182 14:00 CRP 479
[REDACTED] 030 DOB 3/4/1960 44 yo Abdo Pain	Must review! ?diverticulitis. RIF mass,pain,fever. On IVant's. Free fluids. Keep on free fluids. Check bloods - slip in.	1/2 20:05 Anyx 15 Bili 6 ALT 15 AST 24 ALP 79 APTT 29	Probi 67 Albumin 36 GGT 11 2/27/20 Na 140 K 3.5 Urea 4.5 Creat 45
[REDACTED] Andrew 028 DOB 11/10/1948 56 yo Cholecystitis	Review necessary. On clear fluids. Can progress to diet as tolerated. Keep in over u-end. check bloods.	1/26:10 Lpax 27 AST 42 ALP 164 GGT 111	Probi 65 Albumin 36 Bili 7 ALT 65 AST 42 ALP 164 GGT 111
439558 Crowley, S 07 DOB 29/5/1930 74 yo Eis + Drainage Pelvic Abscess		1/2 4:40 Ca 1.93 PO4 0.96	Probi 62 Albumin 22 Bili 14 ALT 17 AST 15 ALP 64 GGT 17
[REDACTED] 130 DOB 21/7/1952 52 yo Right Upper Quadrant Pain		1/2 10:15 Anyx 41 Lpax 100 ALT 17 AST 22 ALP 82 APTT 35	Probi 79 Albumin 40 Bili 5 ALT 17 AST 22 ALP 82 GGT 9
177892 Watters, D 05-HW6 DOB 5/8/1924 80 yo mesenteric embolis.	small bowel mesenteric embolis, for anticoagulation	1/2 8:08 Lpax 191 INR 2.4 APTT 35	Probi 80 Albumin 41 Bili 20 ALT 20 AST 40 ALP 88 GGT 33
[REDACTED], Sebastiano 184278 Thorne, M Day 4 DOB 7/11/1931 73 yo ascending cholangitis	Lap Chole 7/12 ago privately. 4 days increasing colicky pain, now obstructive jaundice and temperature. Needs US Saturday and coags prior to ERCP on ? Monday	1/2 15:45 Anyx 68 Lpax 199 INR 1.0 APTT 29	Probi 63 Albumin 36 Bili 23 ALT 189 AST 103 ALP 221 GGT 483
[REDACTED] Andrew 039067 Kidman, D Day 3 DOB 22/10/1964 40 yo		1/2 8:30 Ca 2.45 PO4 1.12	Probi 85 Albumin 47 Bili 9 ALT 22 AST 17 ALP 127 GGT 25
[REDACTED] Lore Marie 057021 Mitchell, G Day 2 DOB 4/6/1923 81 yo [REDACTED]roscopy		2/2 20:00 INR 1.0 APTT 27	2/2 20:00 Na 141 K 4.2 Urea 5.0 Creat 70
339744 Heffernan, E Day 2 DOB 28/10/1976 28 yo Trauma		Probi 72 Albumin 36 Bili 6 ALT 40 AST 40 ALP 140 GGT 54	2/2 18:00 Na 140 K 4.0 Urea 3.2 Creat 74

Handover on Friday afternoon

Tasklist - Surgical Unit 1

Patient Details	Notes	Results
Ward Heath Wing Level 6 1 patient		
<p>[Redacted] y [Redacted], K Day 8 DOB 29/3/1913 91 yo Metastatic CA of unknown primary</p>	<p>Rapid Af / non comp with dig Dig load. NFR ?Melanoma on Trucut. Awaiting Onco and Pall care review. AF under control. Developed haematoma from trucut site. ?infected. Overlying</p>	<p>2028:00 142 15:45 Probin40 2128:10 2128:10 Ca 1.96 Any/e 17 Album120 Na 142 Hb 52 PO4 0.96 ALT 7 BIL 7 K 3.5 Pl 331 ALT 9 Urea 6.7 WCC 9.5 2128:10 AST 19 Creat 18 Net 7.49 INR 1.3 ALP 88 142 15:45 APTT 29 GGT 67 CRP 263</p>
Ward Intensive Care Unit 2 patients		
<p>[Redacted] earne [Redacted], J Day 22 DOB 3/7/1932 72 yo Abdo Pain F.i.</p>	<p>Ongoing sepsis of unknown origin. ?Vegetation aortic valve on TOE Fnl. For CT Brain/abdo this pm. Prev abdo CT only showed large R psaos haematoma (non-infected). Re-intubated due to respiratory distress.</p>	<p>2124:30 142 4:00 Probin 64 2124:30 2124:00 Ca 2.37 Any/e 84 Album121 Na 135 Hb 50 PO4 0.62 Lp(a) 241 BIL 27 K 3.8 Pl 503 ALT 834 Urea 14.3 WCC 32.2 2124:00 AST 500 Creat 84 Neu 15.94 INR 1.0 ALP 201 132 3:30 APTT 28 GGT 293 CRP 54</p>
<p>[Redacted] n Bernard [Redacted], J Day 17 DOB 10/12/1942 62 yo Small Bowel Obstruction</p>	<p>Adhesions. Div adhesion and ileocolic resection Tue. Returning to ICU due to decrease increasing resp distress. Overloaded and basal acetalactasis (bilat). Abdo CT no leak/free gas. Some pelvic free fluid. Febrile neutropenic on broad AB cover. PHx Large B cell</p>	<p>2124:30 142 4:50 Probin45 2124:30 2124:30 Ca 2.20 Any/e 10 Album119 Na 136 Hb 57 PO4 1.18 Lp(a) 124 BIL 24 K 4.0 Pl 18 ALT 11 Urea 9.0 WCC 3.8 2124:30 AST 16 Creat 82 Neu 0.62 INR 1.1 ALP 177 142 3:00 APTT 38 GGT 371 CRP 293</p>

If this information is current then this is helpful
All entries automatically dated

Monday morning handback

Tasklist - Surgical Unit 2

Printed By: David Watters
Monday 21/2/05 11:34 am

Patient Details	Notes	Results
Ward Bellerine Centre 6 North 2 patients		
[REDACTED] Cheryl Diane Day 5 29-B0N DOB 15/7/1949 55 yo Right Mastectomy+axillary Clearance 1	Has had ST. Hb last night 71. Given 2 units blood. Pls check Hb. 1 more bag available if still low. DTs to stay in.	21/2 8:25 PO4 1.09 Proth T4 Abin137 Bil 4 ALT 19 AST 18 ALP 110 GGT 2 21/2 8:25 Na 143 Hb 141 K 3.5 Pl 288 Urea 4.5 WCC 6.1 Creat 73 Met 3.01
[REDACTED] Limer Day 5 12A DOB 4/9/1940 64 yo Hernia Repair 17/2	Developed scrotal swellin fr. USS - fluid in ing canal and scrotum. Mr tauler aware. Pt can still go home sat if able to urinate (IOC being removed 6am sat)	21/2 8:40 Na 137 Hb 138 K 4.1 Pl 238 Urea 5.7 WCC 9.7 Creat 125 Met 6.46 21/2 8:40 CRP 66
Ward Birdsey Wing 7 1 patient		
[REDACTED] Day 6 00D DOB 23/7/1943 61 yo Diverticulitis	May have LWD sat. Has DVC meds if home over WVE. CT and Xray nad. Will have colonoscopy as OP.	15/2 13:45 Lpdt 236 25/16:40 INR 1.1 APTT 29 Proth 88 Abin135 Bil 9 ALT 26 AST 25 ALP 99 GGT 17 15/2 10:50 Na 141 Hb 149 K 4.3 Pl 247 Urea 3.1 WCC 8.2 Creat 59 Met 5.69 15/2 10:50 CRP 11
Ward Heath Wing Level 6 5 patients		
[REDACTED] Joy Day 14 112051 [REDACTED] DOB 8/5/1950 54 yo Drainage Of Wound	Incisional hernia repair 24/11/04 that dehisced on 1/1/05. Developed collection that was manually debrided 8/2/05. Faye Hector has set up irrigation. no need to see.	14/2 16:25 Ca 2.25 PO4 1.25 20/6 23:30 INR 1.0 APTT 31 Proth T4 Abin135 Bil 7 ALT 44 AST 23 ALP 78 GGT 171 15/2 8:45 Na 137 Hb 124 K 4.5 Pl 531 Urea 3.4 WCC 8.7 Creat 60 Met 5.31 15/2 7:40 CRP 163
[REDACTED] White, R Day 13 09C DOB 28/1/1934 70 yo Cholecystitis/Pancreatitis	10/2: Haematemesis and decreased BP Sat mom: Gastroscopy in pm showed 2 small ulcers with signs of fresh bleeding ("Mechanical Heart Valves") - Aspirin ceased, Warfarin W/H, 2mg Mt K, 2500U Heparin, Omeprazole 40mg iv bd. - for R/v	14/2 8:00 Anyte 23 Lpdt 272 21/2 7:40 INR 1.2 APTT 55 Proth T0 Abin137 Bil 15 ALT 67 AST 45 ALP 118 GGT 112 21/2 7:40 Na 142 Hb 118 K 4.7 Pl 263 Urea 3.3 WCC 6.2 Creat 81 Met 3.23 15/2 8:40 CRP 15
[REDACTED] Anthony Day 12 02A DOB 5/7/1942 62 yo Extended R hemicolectomy 10/2	Doing well. priv patient Mr white. DVC mon. No need to see.	11/2 4:10 Ca 1.54 PO4 0.96 10/2 17:50 Anyte 31 Lpdt 161 11/2 4:10 INR 1.1 APTT 26 Proth57 Album125 Bil 11 ALT 25 AST 30 ALP 62 GGT 3 11/2 8:35 Na 136 Hb 139 K 4.5 Pl 285 Urea 6.5 WCC 9.4 Creat 69 Met 7.74
[REDACTED] Michael Day 6 01C DOB 19/5/1950 54 yo Open Appendectomy 10/2	May go onto FWD sat. IVABs tomorrow, then cease. DT still in as draining fair amount. Maybe out sunday.	21/2 7:35 Na 140 Hb 122 K 3.5 Pl 347 Urea 4.9 WCC 10.3 Creat 86 Met 6.54 18/2 14:00 CRP 473

Minimum Data Set

- How do we get some structure to the handover information?
- Concept of vital and desirable information on handover

Electronic Benefits

- System enables the minimum data set
 - Consistent
 - Highly accurate
 - Reduces misinterpretation
 - Data stored
 - Required information provided

What information should be handed over?

- Who and Where
- Current Diagnosis
- Recent Procedures
- Specialist Availability
- Urgency of Review
- Issues for Review
- Investigations needed or pending

The information already available

- Name & Identifier
- Location (Ward & Bed Number)
- Specialist responsible
- Treating Unit
- Procedures performed

Data to be entered

- Current Diagnosis
- The Urgency for Review
- Issues for review
- Date of Handover
- Who is handing over
- Availability of Specialist

Handover Functionality

- Print a list of patients to be reviewed
- Sort the list by urgency or location
- Enter the full electronic record from list
- Be able to add consults from other units
- Show date & time of last update
- Retain record of who entered what and when



Problems Encountered

Data wanted from more than one database

Reluctance to give up adhoc or handwritten systems

Duration of validity of data entered

Patient lists may include tasks to be completed for patients already discharged

Other Issues

- TIME - Allocated Handover Time
 - 15-30 mins at shift changeover
 - Availability of IT Resources
 - Support from “top down” ie. Consultant level support
 - Need to tailor systems to local needs

Summary Slide

- Electronic handover is a useful backup for “unexpected unwell” and as such is a backup to verbal handover
- “Minimum Data Set” a useful framework and can be modified to meet local needs
- Performance is only as good as quality of data
- Handover needs to be supported “from the top down”
- Time allocation critical

Handover *only*

works

if **everyone** does it...

