

Bluebird

Window to the Ward

A large monitor displaying the Bluebird patient care interface. The interface includes a navigation bar with 'Bluebird', 'Lists', 'Ward', and 'Reports'. A dropdown menu shows 'Trauma ICU' and 'Hout Bay'. The main content area features a table with columns for Name, Diagnosis / Hx, Surgery, Tasks, Micro, Devices, Alert, Feeding, Clinical, Drugs, Vitals, and Beds. The patient data for 'Kamm, Long 54 M' is displayed, including contact information, diagnosis ('Chest Pain'), surgery ('CABG 3'), and vital signs ('BP 140/80'). A 3D rendering of a patient in a hospital bed is overlaid on the interface.

Name	Diagnosis / Hx	Surgery	Tasks	Micro	Devices	Alert	Feeding	Clinical	Drugs	Vitals	Beds
Kamm, Long 54 M 6112031307749 1007245596 03/12/1961 Naima Curran 20/07/2016 12:17	Chest Pain	CABG 3			Cath 46				Abx	BP 140/80	06/06/16 [45 45] Bed 4 Gen Room 1

Table of Contents

Introduction	3
Current Doctor's Bluebird Interface (without Hospital Access)	4
New Interface for Doctors with Patients in Bluebird enabled Hospitals	5
Alerts Tab	6
Inpatient Tab	10
Discharged Tab	16

Introduction

For more than 20 years South African doctors have trusted Bluebird to reliably manage their laboratory results. More than 70 private South African hospitals also put their trust in Bluebird's electronic laboratory service.

Doctors with patients in Bluebird enabled hospitals have an enhanced Bluebird service that facilitates:

1. Real time, remote access to their patient's **lab results** at any Bluebird enabled hospital.
2. Real time, remote access to their patient's **location** in any Bluebird enabled hospital. Over time this feature will be enhanced further to show summary data for those patients.
3. Real time, remote access to **infection control alerts** in any Bluebird enabled hospital. Over time this feature will be enhanced further to show a broader range of alerts, including those for abnormal labs.
4. Remote access to a list of that doctor's **patients discharged** from any Bluebird enabled hospital. Over time this feature will be enhanced further to show summary data about those discharged patients.

Current Doctor's Bluebird Interface (without Hospital Access)

The overwhelming majority of the more than 4 000 South African doctor's that signed up for Bluebird, use Bluebird to access laboratory results (a minority use Bluebird to access radiology reports, referral requests and consultations). The screenshot below shows a list of patient reports in a physicians Bluebird **Inbox**.

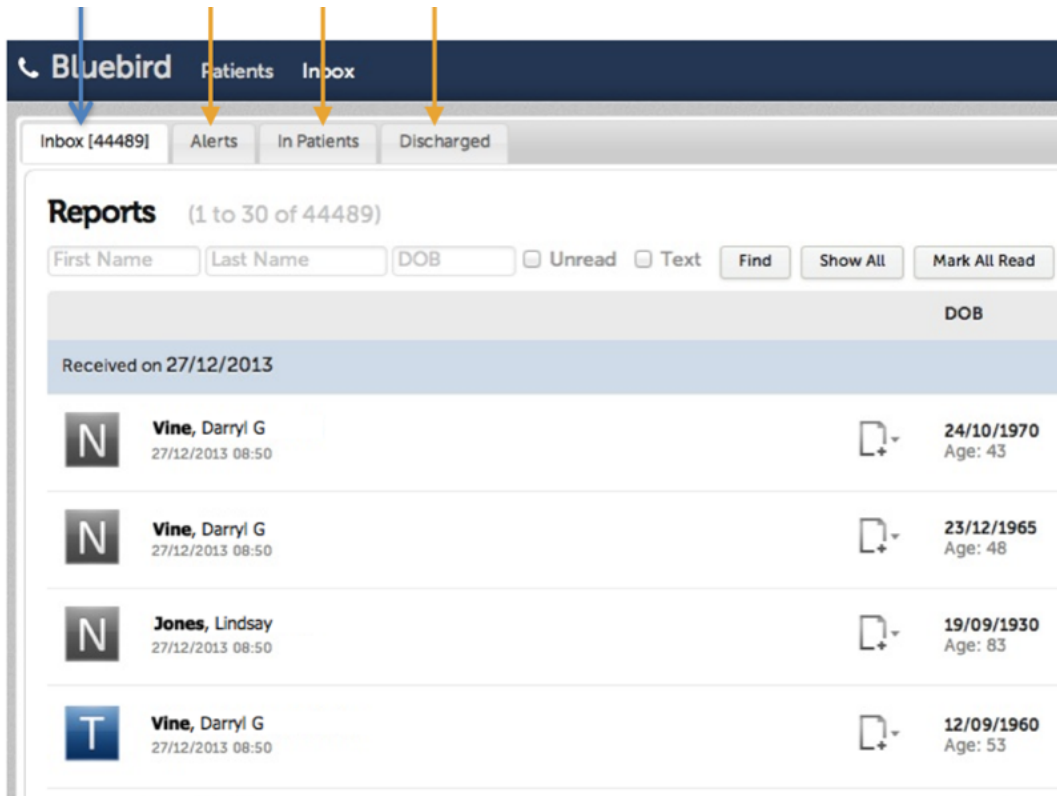
	DOB	Type	Collection Date	Folder	From	Status
Received on 27/12/2013						
N Vine, Darryl G 27/12/2013 08:50	24/10/1970 Age: 43	Serology	27/12/2013 04:54	435672 ID: 6510234590084	DSP	Complete
N Vine, Darryl G 27/12/2013 08:50	23/12/1965 Age: 48	Haematology Abn	27/12/2013 06:20	58195 ID: 6510234590084	DSP	Complete
N Jones, Lindsay 27/12/2013 08:50	19/09/1930 Age: 83	Biochemistry Abn	27/12/2013 06:55	94582 HOSP ID: 6510234590084	DSP	Complete
T Vine, Darryl G 27/12/2013 08:50	12/09/1960 Age: 53	Microbiology Negative STOOL STOOL	23/12/2013 21:40	94284 HOSP ID: 6510234590084	DSP	Complete
N Phillips, Susan 27/12/2013 08:50	23/12/1965 Age: 48	Biochemistry Abn	27/12/2013 06:20	58195 ID: 6510234590084	DSP	Complete
T Peters, Daniel 27/12/2013 08:50	23/02/1943 Age: 70	Histology	24/12/2013 00:00	NOT AVAILABLE ID: 6510234590084	DSP	Complete
N Jones, Lindsay 27/12/2013 08:50	24/10/1970 Age: 43	Biochemistry Abn	27/12/2013 04:54	435672 ID: 6510234590084	DSP	Complete
T Jones, Lindsay 27/12/2013 08:50	28/10/1943 Age: 70	Microbiology Negative [P] PLUS SWAB Provisional PLUS SWAB	26/12/2013 15:15	181497 HOSP ID: 6510234590084	DSP	Provisional
N Peters, Daniel 27/12/2013 08:50	09/01/1965 Age: 48	Biochemistry Abn	27/12/2013 06:25	ID: 6510234590084	DSP	Complete

Clicking any line item shows the full report as sent from the lab, radiologist or referring or consulting doctor. One can also create lab requisitions.

This "Window to the Ward" service gives Bluebird doctors remote access to their patients in any participating Bluebird enabled hospital!

New Interface for Doctors with Patients in Bluebird enabled Hospitals

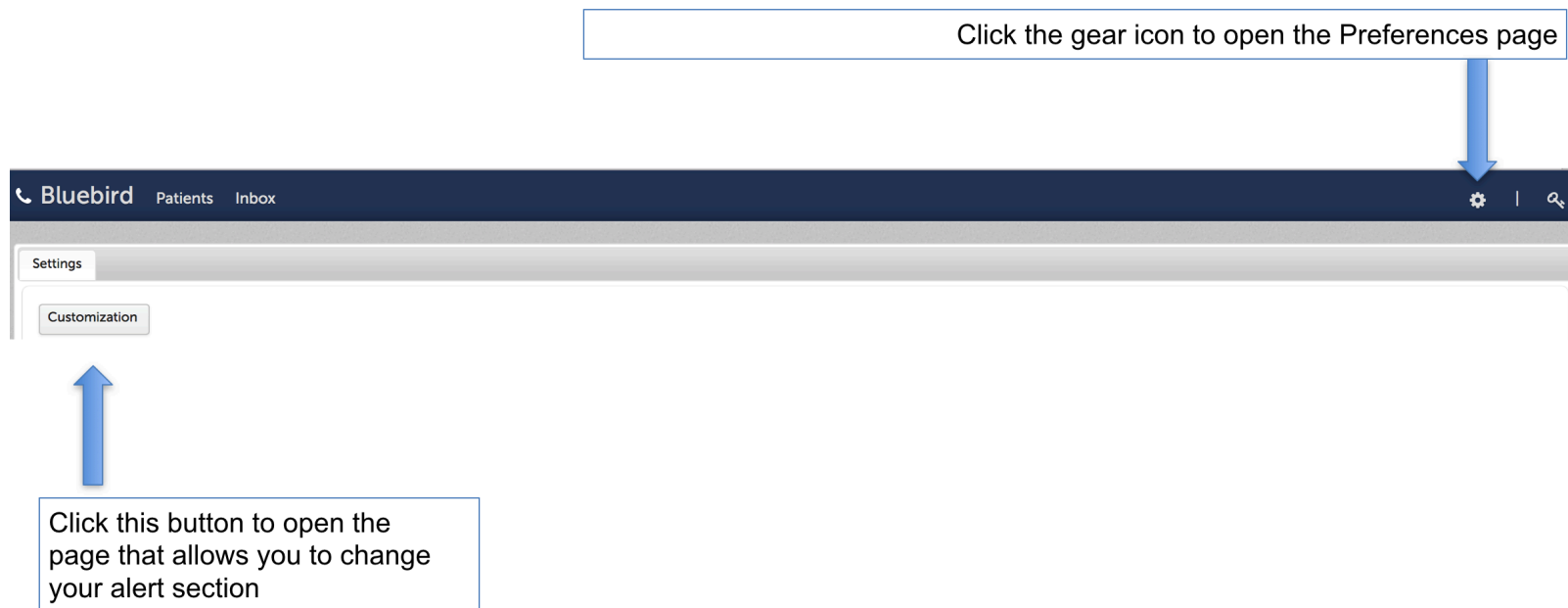
In addition to the **Inbox** (blue arrow in the image below), there are **3 new tabs** (gold arrows), each of which is discussed separately below. The 3 new functions (Alerts, InPatient Remote Access and a list of Discharged Patients) make it dramatically easier for doctors working in Bluebird enabled hospitals to provide optimal care for their patients.



Alerts Tab

The alerts tab shows alerts sent to you about your inpatients. For example, if an inpatient has a multi drug resistant organism (MDRO) you can elect to receive a real time Bluebird alert.

You are able to modify the alerts you wish to receive for your hospital patients.



Clicking “Customization” will bring up the alert selection tab shown on the next page.

Alerts

Hospital Group:

Organism

- CDI(Clostridium difficile (CDI))
- MRSA(Methicillin-resistant staphylococcus aureus (MRSA))
- VRE(Vancomycin resistant Enterococcus spp (VRE))
- LRE(Linezolid resistant Enterococcus spp (LRE))
- CRKP(Carbapenem Resistant Klebsiella pneumoniae)
- CRE(Carbapenem-resistant Enterobacteriaceae)
- CephRK(Drug Resistant Klebsiella spp.)
- PDR(Pandrug Resistant - Resistant to all drugs tested)
- XDR(Extreme Drug Resistant)
- Enterobacteriaceae MDR(Enterobacteriaceae Resistant to one or more carbapenems and to cephalosporins)
- Acinetobacter MDR(Multi-drug resistant (MDR) Acinetobacter spp.)
- MDR(Multi-drug resistant organism)
- ESBL(ESBL Producing Organism)
- Pseudomonas XDR(XDR Pseudomonas aeruginosa)
- Acinetobacter XDR(XDR Acinetobacter baumannii)
- VRSA(Vancomycin-resistant staphylococcus aureus (VRSA))
- VISA(Vancomycin-intermediate staphylococcus aureus (VISA))
- Drug Resistant Isolate(Drug Resistant Isolate)
- CPO(Carbapenemase Producing Organism)
- PossibleCR(CRE)
- AmpC(Organism with AmpC)
- Inhibit-res betalactamase(Inhibitor-resistant beta-lactamase Producing Organism)
- Bloodstream infection(Bloodstream infection)
- CRAB(Carbapenem resistant Acinetobacter baumannii)
- CRPA(Carbapenem resistant Pseudomonas aeruginosa)
- C. auris(Candida auris)

Abn. Labs

- Abn. SI(Abnormal SI)
- Abn Renal, nephrotoxic abx(Abnormal Renal function with nephrotoxic drug)

Recommendation

- Pharmacist Abx(Pharmacist Abx Recommendation)

Save

The list of the in patient alerts currently offered is shown to the right.

Deselect the inpatient alerts you do not want to see in Bluebird.

Over time you might wish us to provide additional alerts pertaining to your inpatients. Please discuss with your hospital manager.

To review alerts, click the **Alerts Tab** (see screenshot below). This will open a split screen with the left pane showing a line list of alerts.

The screenshot shows the Bluebird Alerts interface. At the top, there are tabs for 'Inbox [0]', 'Alerts', 'In Patients', and 'Discharged'. The 'Alerts' tab is selected. Below the tabs, the title 'Alerts (1 to 30 of 71)' is displayed. A search bar with the placeholder text 'Click to search' is present. The main content is a table with the following columns: Status, Type, Alert Date, Patient, DOB, and Ward. The table contains five rows of alert data.

Status	Type	Alert Date ↓	Patient	DOB	Ward
Open unread	Pharmacy Intervention Review Prescription	18/10/2017 12:26	Barker, Gareth 1003360589 1009093431	21/12/1946 Age: 70 Gender: M	augsicu Surgical ICU Fish Bowl, Surgical ICU Ward Bed 17 27779727
Open unread	Organism Acinetobacter XDR Acinetobacter baumannii	18/10/2017 12:19 Fluid (Not Stated)	Oosthuizen, Hendrik Arnoldus 1005081423 1009079068	27/12/1963 Age: 53 Gender: M	oliwsec6 Section 6 Room 11, Section 6 Room 11 Bed A 27779751 (20596215)
Open unread	Organism ESBL /MDR Escherichia coli	18/10/2017 12:19 Fluid (Not Stated)	Oosthuizen, Hendrik Arnoldus 1005081423 1009079068	27/12/1963 Age: 53 Gender: M	oliwsec6 Section 6 Room 11, Section 6 Room 11 Bed A 27779754 (20596218)
Open unread	Organism ESBL /MDR Escherichia coli	18/10/2017 12:19 Urine (Not Stated)	Baboo, Kamala 1002489125 1009088828	06/09/1942 Age: 75 Gender: F	milcicu Coronary Care Unit, Coronary Care Bed 8 27779757 (20596242)
Open unread	Organism CRKP /MDR +CRE Klebsiella	18/10/2017 12:13 Tracheal	Herzog, Demetric 1009021608	20/10/1972 Age: 44 Gender: M	hbsec1 hbsec1 27779748

At the bottom of the table, there is a pagination control showing '1 2 3 Next > Last »'.

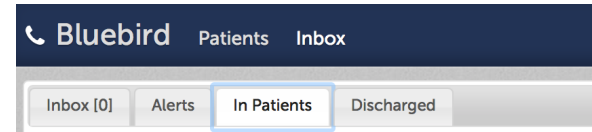
Selecting any alert will show alert specific detail on the right pane:

The screenshot shows the Bluebird software interface. At the top, there are tabs for 'Inbox [0]', 'Alerts', 'In Patients', and 'Discharged'. Below this is a search bar and a list of alerts. The second alert in the list is selected, highlighted in blue. This alert is for a 'Pharmacy Intervention' (Review Prescription) for patient Greyling, Johanna Susanna, dated 18/10/2017 at 12:00. The right-hand pane shows the 'Whiteboard Drill Down' for this patient, including a 'Urinary catheter, IV' section with various icons and a 'Greyling, Johanna Susanna' section with a note: 'Stroke, not specified as haemorrhage or infarction'. Below this is a table with columns for 'Alert', 'TClinical', 'Notes [0 | 0]', and 'Tasks [0 | 0]'. The 'Alert' section shows 'Alert Type: Pharmacy Intervention', 'Status: Open', 'Condition: Review Prescription', and 'Alerted At: 18/10/2017 12:00'. The 'Intervention Detail' section shows 'Intervention Type: Inappropriate drug choice' and 'Recommendation: Switch patient to one of the Antibiotics that the organism is sensitive to - results chart provided.' At the bottom of the right pane is a 'Close Alert' button.

Status	Type	Alert Date ↓	Patient	DOB	Ward
Open unread	Pharmacy Intervention Review Prescription	18/10/2017 12:06	Theunissen, Rudolf Johannes 1002174657 1009092503	20/08/1922 Age: 95 Gender: M	bouwicu Room ICU, ICU Bed C 27779769
Open unread	Pharmacy Intervention Review Prescription	18/10/2017 12:00	Greyling, Johanna Susanna 1003542781 1009087612	03/07/1947 Age: 70 Gender: F	cliwicu ICURoom1, ICURoom1 27778953
Open unread	Organism XDR Streptococcus viridans group	18/10/2017 11:50 Blood (Not Stated)	Mokoena, Botshelo Kamogelo 11010703 ADT	27/11/2016 Age: 0 Gender: M	naimed Discharged 24/05/2017 27778950 (20595699)
Open unread	Pharmacy Intervention Review Prescription	18/10/2017 11:43	Khawula, Ceciltimothys 1001576366 1008995653	02/06/1987 Age: 30 Gender: M	sungeramium Geranium - Room 3, Geranium - Room 3 - Private 27778485
Open unread	Pharmacy Intervention Review Prescription	18/10/2017 11:31	Dunn, Bralene 1004478455 1009097693	01/02/2015 Age: 2 Gender: F	augpaed Paediatric Ward Room 602, Paediatric Ward Bed 602 27778956
Open	Pharmacy	18/10/2017	Trollip, Meleah Samiya	05/05/2017	augpaed Paediatric Ward Room

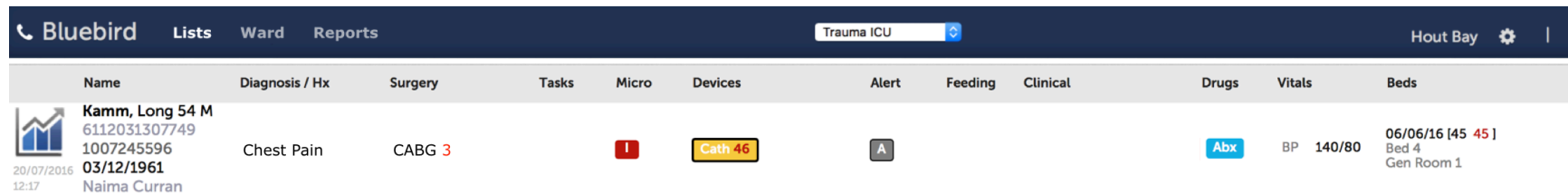
Notes:

1. The selected alert turns blue.
2. Detail is shown on the R Pane
3. To close the alert, the "Close Alert" button must be selected.



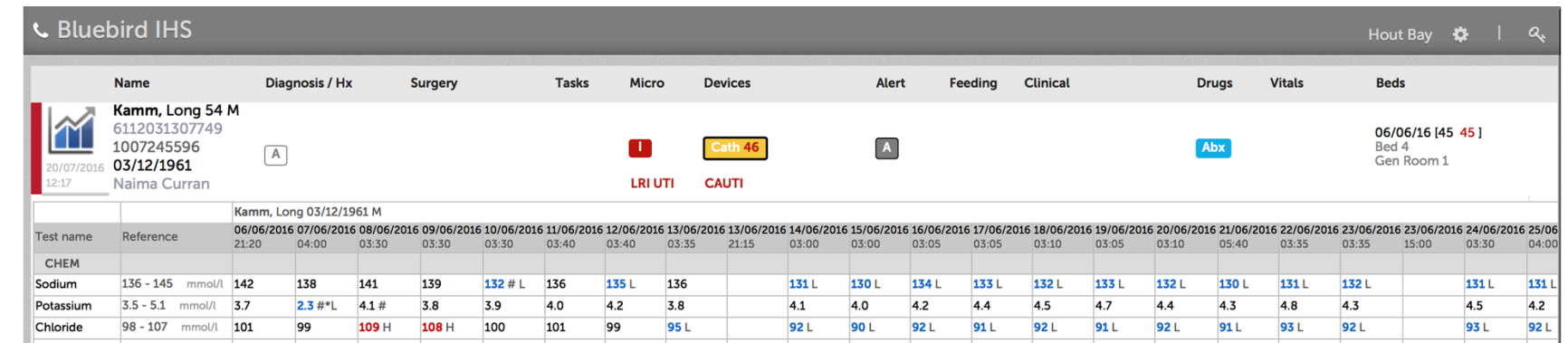
Inpatient Tab

The feature we are most excited about is the new **InPatients Tab**, a real time, “Window to the Ward” which, when selected, shows a line list of your patients in any Bluebird enabled hospital (broken down by hospital and ward). Thumbnail information is shown for each patient:



Clicking any section of the patient line will open a new (secondary) browser tab with detail about the section clicked. In the example below, these are the important things to note:

1. The header of a secondary browser tab is grey. These tabs are meant to be closed once you have reviewed that section.
2. The lab section (the one with the blue graph icon) of patient Long Kamm has been selected (the grey horizontal bar below the lab section tells you it has been selected) . Below the patient line on this secondary tab shows all the labs for Long Kamm during this admission.
3. Only one patient is shown on secondary browser tabs which should be closed once you are done with this subset of information. This is in contrast with the primary Blue header tab which remains open.





Initially, only a subset of all the clinical information shown above will be available. Hospitals plan to make progressively more information available on the **Inpatient Tab**. To begin with, you will get real time access to all labs done on your patients in any Bluebird enabled hospital. Access this function by clicking the lab section (first section) of the patient line. Note that the date and time of the last lab that has arrived for this patient is shown below the graph icon.

The next image shows what information, hospitals will, over time, make available for each patient.

Name	Diagnosis / Hx	Surgery	Tasks	Micro	Devices	Alert	Feeding	Clinical	Drugs	Vitals	Beds
 Kamm, Long 54 M 6112031307749 1007245596 03/12/1961 Naima Curran	Chest Pain	CABG 3								BP 140/80	06/06/16 [45 45] Bed 4 Gen Room 1

In this example, this patient was admitted with chest pain, is post op day 3 following a CABG, has a multi drug resistant isolate (the isolate icon is red), has a foley catheter (x 46 days!), is on at least one antibiotic, has a BP of 140/80 and has been in the hospital (and this ward) for 45 days.

Clicking on any column will pop up more detail about that section, so, for example, clicking the first section (with the graph icon) will pop open a window that displays special investigations done on this patient during the current admission (see next page).

In the beginning Bluebird will not display the surgery, tasks, feeding, clinical or vitals columns, but, as your hospital finds ways to document that information in Bluebird in a timely manner, those columns will be unmasked (at the moment there is a delay in documenting some of that information and hospitals worry that if, for example, the operative procedure only gets documented by day 3, you won't see anything on day 1 and 2).

The next 2 pages show that happens when the lab (first) section of a patient line is selected.

Note that the secondary browser tab that opens with **cumulative lab results** for this patient is grey.

Note the colour coding of numeric results. Blue indicating abnormally low, and red abnormally high values.

Clicking the numeric result shows the full original lab report.

Bluebird Hout Bay

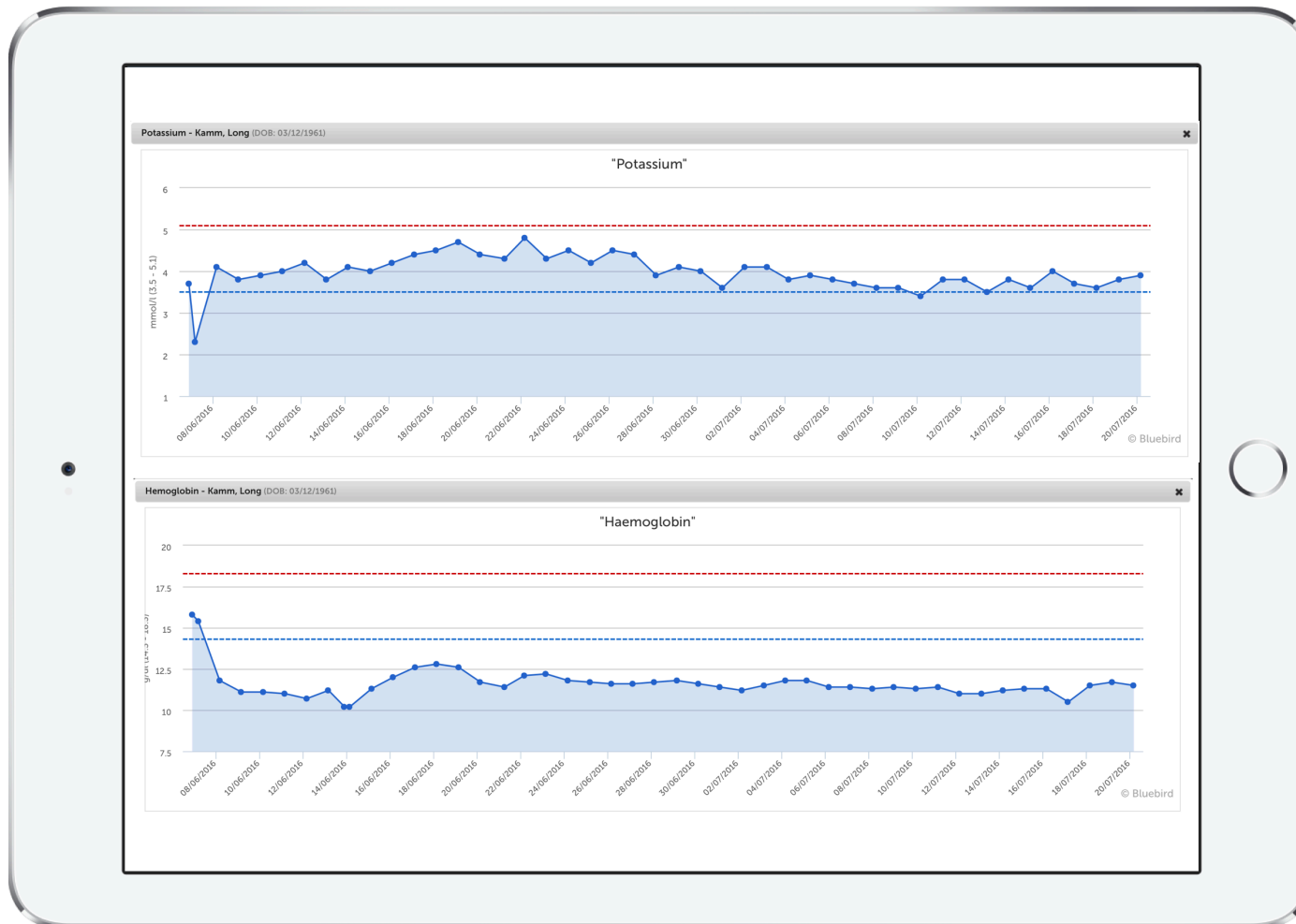
Name: Kamm, Long 54 M
 6112031307749
 1007245596
 03/12/1961
 Naima Curran

Diagnosis / Hx: [A]
 Surgery: [A]
 Tasks: [A]
 Micro: [A]
 Devices: Cath46
 Alert: [A]
 Feeding: [A]
 Clinical: [A]
 Drugs: Abx
 Vitals: [A]
 Beds: 06/06/16 (45 45)
 Bed 4
 Gen Room 1

20/07/2016 12:17

Test name	Reference	06/06/2016 21:20	07/06/2016 04:00	08/06/2016 03:30	09/06/2016 03:30	10/06/2016 03:30	11/06/2016 03:40	12/06/2016 03:40	13/06/2016 03:35	14/06/2016 21:15	15/06/2016 03:00	16/06/2016 03:05	17/06/2016 03:05	18/06/2016 03:10	19/06/2016 03:05	20/06/2016 03:10	21/06/2016 05:40	22/06/2016 03:35	23/06/2016 03:35	24/06/2016 15:00	25/06/2016 03:30	26/06/2016 03:30	27/06/2016 04:00	
CHEM																								
Sodium	136 - 145 mmol/l	142	138	141	139	132 # L	136	135 L	136		131 L	130 L	134 L	133 L	132 L	133 L	132 L	130 L	131 L	132 L	131 L	131 L	131 L	131 L
Potassium	3.5 - 5.1 mmol/l	3.7	2.3 # L	4.1 #	3.8	3.9	4.0	4.2	3.8		4.1	4.0	4.2	4.4	4.5	4.7	4.4	4.3	4.8	4.3			4.5	4.2
Chloride	98 - 107 mmol/l	101	99	109 H	108 H	100	101	99	95 L		92 L	90 L	92 L	91 L	92 L	91 L	92 L	91 L	93 L	92 L			93 L	92 L
CO2	22 - 29 mmol/l	28	12 # L	25 #	23	22	24	25	27		27	26	27	28	26	28	28	27	27	27			27	26
Calcium	2.15 - 2.50 mmol/l				2.05 L				2.33 #			2.37				2.43			2.51 H					
Phosphate	0.78 - 1.42 mmol/l				0.40 L				0.55 # L			1.26 #				1.25			1.20					
Magnesium	0.66 - 1.07 mmol/l				0.76				0.77			1.06 #				0.89 #			0.85					
Anion Gap	8 - 20 mmol/l	17	29 H	11	12	14	15	15	18		16	18	19	18	19	19	16	16	16	17			16	17
Amylase	<110 U/l	80																						
CRP	< 5 mg/l		12 H	208 # H	306 # H	324 # H	237 # H	169 # H	97 # H		84 H	68 H	71 H	63 H	57 H	54 H	45 H	46 H	39 H	36 H			35 H	30 H
PCT	0.00 - 0.05 ng/ml					5.69 # H	3.03 # H																	
Haematology																								
Hemoglobin	14.3 - 18.3 g/dl	15.8	15.4	11.8 # L	11.1 L	11.1 L	11.0 L	10.7 L	11.2 L		10.2 L	10.2 L	11.3 L	12.0 L	12.6 L	12.8 L	12.6 L	11.7 L	11.4 L	12.1 L	12.2 L		11.8 L	11.7 L
Hct	43.0 - 55.0 %	44.2	44.0	34.7 # L	33.1 L	32.1 L	31.4 L	30.8 L	32.4 L		29.2 L	32.2 # L	34.6 L	36.4 L	37.3 L	37.6 L	34.4 L	33.8 L	35.3 L	36.1 L		35.1 L	34.9 L	34.9 L
RBC	4.89 - 6.11 10 ¹² /l	4.98	4.94	3.85 L	3.60 L	3.56 L	3.52 L	3.44 L	3.63 L		3.28 L	3.63 L	3.87 L	4.05 L	4.13 L	4.12 L	3.77 L	3.71 L	3.91 L	4.00 L		3.83 L	3.81 L	3.81 L
MCV	79.1 - 98.9 fl	88.8	89.1	90.1	91.9	90.2	89.2	89.5	89.3		89.0	88.7	89.4	89.9	90.3	91.2	91.1	90.3	90.3	91.6		91.6	91.6	91.6
MCH	27.0 - 32.0 pg	31.7	31.2	30.6	30.8	31.2	31.3	31.1	30.9		31.1	31.1	31.0	31.1	31.0	30.6	31.0	30.7	30.9	30.5		30.8	30.7	30.7
MCHC	31.0 - 37.0 g/dl	35.7	35.0	34.0	33.5	34.6	35.0	34.7	34.6		34.9	35.1	34.7	34.6	34.3	33.5	34.0	33.7	34.3	33.8		33.6	33.5	33.5
Platelets	150 - 450 10 ⁹ /l	206	278	95 # L	85 L	89 L	99 L	111 L	175 #		209	253	318	343	383	415	393	416	482 H	477 H		479 H	459 H	459 H
RDW	10.0 - 16.3 %	13.8	13.8	14.0	14.3	13.6	13.1	13.2	13.4		13.4	13.5	13.7	13.5	13.9	13.5	13.3	13.1	12.8	13.1		13.4	13.4	13.4
WBC	3.92 - 9.88 10 ⁹ /l	9.87	14.19 H	7.03 #	8.29	7.88	6.64	7.47	11.91 # H		12.50 H	14.55 H	17.84 H	18.54 H	17.56 H	14.08 H	10.36 H	7.23	8.24	10.52 H		8.46	9.38	9.38
Neutrophils %	%	68.3	77.2	78.0	83.8	81.6	73.3	81.1	64.7		67.0	78.5	86.2	85.1	83.0	79.7	74.3	66.4	70.3	74.3		68.5	72.9	72.9
Neutrophils Abs	2.00 - 7.50 10 ⁹ /l	6.74	10.96 # H	5.48	6.95	6.43	4.87	6.06	7.71 H		8.36 H	11.42 H	15.36 H	15.77 H	14.58 H	11.22 H	7.70 H	4.80	5.79	7.82 H		5.80	6.84	6.84
Eosinophils %	%	0.5	0.0	0.6	2.1	2.3	1.8	0.4	0.6		1.0	1.0	0.7	0.6	0.9	1.1	1.5	2.8	1.5	0.9		1.3	1.8	1.8
Eosinophils Abs	0.00 - 0.45 10 ⁹ /l	0.05	0.00	0.04	0.17	0.18	0.12	0.03	0.07		0.13	0.14	0.13	0.12	0.16	0.16	0.16	0.20	0.12	0.09		0.11	0.17	0.17
Basophils %	%	0.3	0.1	0.0	0.1	0.0	0.2	0.1	0.7		1.1	0.4	0.2	0.2	0.2	0.2	0.2	0.7	0.2	0.3		0.4	0.3	0.3
Basophils Abs	0.00 - 0.20 10 ⁹ /l	0.03	0.01	0.00	0.01	0.00	0.01	0.01	0.08		0.14	0.06	0.04	0.04	0.03	0.03	0.02	0.05	0.02	0.03		0.03	0.03	0.03

If one clicks the **Test Name**, the results are shown in a graphic format.



Hovering over any point on the graph brings up a tool tip showing more information.

The **Infective Section** of the patient line shows the micro results during this admission. Note the grey bar under the **Infective** heading.

The left pane is a line list of all micro returned. Clicking any item in that list will show detail about that isolate (including the work done by the hospital infection control to classify that isolate).

Note that MDR high risk isolates (typically the ESKAPE isolates) are colour coded red. MDR isolates that usually don't require isolation are coloured orange and non MDROs are blue.

The screenshot displays the Bluebird patient care system interface. At the top, the patient's name 'Reilly, Sterling 49 M' and MRN '1008126191' are visible. The 'Infective' tab is selected, showing a list of microbiology results. The results are color-coded: red for MDR high risk, orange for MDR, and blue for non-MDROs. A grey bar highlights the 'Infective' section.

Recorded Collected	Patient	DOB	Organism	Current Ward
03/04/2017 27/03/2017	Reilly, Sterling 1002600466 1008126191	25/04/1968 Age: 49 Gender: M	AMP Providencia stuartii Bloodstream infection Blood	hbradman, Bradman Unit, Bradman Unit Bed 30 7691230 1
03/04/2017 27/03/2017	Reilly, Sterling 1002600466 1008126191	25/04/1968 Age: 49 Gender: M	AMP Mabsiella pneumoniar CephRK,MDR +ESBL Carbapenemase Urine	hbradman, Bradman Unit, Bradman Unit Bed 30 7691229 1
03/04/2017 27/03/2017 10/04/2017	Reilly, Sterling 1002600466 1008126191	25/04/1968 Age: 49 Gender: M	AMP Candida parapsilosis Bloodstream infection CVS Blood	hbradman, Bradman Unit, Bradman Unit Bed 30 NONIE 7691228 1
30/03/2017 27/03/2017	Reilly, Sterling 1002600466 1008126191	25/04/1968 Age: 49 Gender: M	AMP Providencia stuartii Catheter (Subclavian catheter tip)	hbradman, Bradman Unit, Bradman Unit Bed 30 7690599 1
30/03/2017 27/03/2017	Reilly, Sterling 1002600466 1008126191	25/04/1968 Age: 49 Gender: M	AMP Acinetobacter baumannii CRAB	hbradman, Bradman Unit, Bradman Unit Bed 30

For now, the **Drugs section** only shows antimicrobials. Other drug categories might be shown in the future. When the **Drug** section is clicked the following screen opens:

Overview | **ABX** | **DrugBug** | Adverse Drug Event | Rec EPA | Rec Pharm [0 | 0] | Allergies | ND Inter. | New Abx

Repeats Provisionals

Antibiotics

Date	Req	Specimen	Site	Organism	ERYTH10	AMXCLV11	PIPTAZ26	Aminoglycosides	AMK	GENT	TOBRA	Carbapenems	DORI	ERTA	IMI	MERO	Polymyxin	COL	Glycolycines	TIG	Cephalosporins 4G	CEFEP	Cephalosporins 3G	CEFOT	CEFTAZ	CEFTRX	Fluoroquinolones 2G	CIPRO	Penicillin + enzyme inhibitor	AMXCLV	PIPTAZ	Tetracyclines	TETRA	Cephalosporins 1G	Cephalothin	Glycoantibiotics
05/10/2015	24029213	Tracheal aspirate		Citrobacter koseri (diversus)	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S
28/09/2015	23619869	Tracheal aspirate		Proteus mirabilis	S	S	S	S	S	S	S	S	S	S	S	S	R	R	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S
05/10/2015	24029213	Tracheal aspirate		Pseudomonas aeruginosa	S	S	S	S	S	S	S	S	R	S	S	S	S	R	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S
20/09/2015	23311211	Tracheal Aspirate	Endotracheal tube	S.aureus	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S

One is quickly able to see the organisms that have been isolated, the antimicrobials prescribed during this admission (green) and those antimicrobials that have been tested against each isolate in the lab. In this case, one is quickly able to see that gentamicin would cover all these organisms!

Discharged Tab

The **Discharge Tab** is a line list of your patients that have been discharged from Bluebird enabled hospitals. Initially this will only show the Date of Admission and Date of Discharge.

Later, it is planned that more detailed information will be available and will be accessed by clicking any patient on that list - watch this space.

Patient	Date of Birth	Admission Date	Discharge Date	Discharge Diagnosis
Hermiston, Charline 6406039834752 1008452477	03/06/1964 Age: 53	02/04/2017 15:08	06/04/2017 13:15	
Schiller, Zoa 2505204924506 1008418104	20/05/1925 Age: 92	13/09/2016 12:25	13/09/2016 12:25	
Schiller, Zoa 2505204924506 1008418104	20/05/1925 Age: 92	11/05/2016 13:37	18/05/2016 17:38	
Hills, Palmer 3705084685636 1006884434	08/05/1937 Age: 78	04/03/2016 00:01	19/03/2016 18:49	
Hills, Palmer 3705084685636 1006884434	08/05/1937 Age: 78	08/02/2016 00:01	03/03/2016 23:59	
Schiller, Zoa 2505204924506 1008418104	20/05/1925 Age: 92	03/02/2016 13:48	12/02/2016 10:00	
Hills, Palmer 3705084685636	08/05/1937 Age: 78	01/08/2015 00:01	07/02/2016 11:58	
Hills, Palmer 3705084685636	08/05/1937 Age: 78	01/08/2015 00:01	07/02/2016 11:58	

Bluebird enabled hospitals can, of course, only provide information that has been *reliably* captured electronically. For the moment that is the organisms isolated in the hospital

Patient	Date of Birth	Admission Date	Discharge Date	Discharge Diagnosis
Jones, Lindsay 610626150173 1004003434	20/08/1956 Age: 57	20/01/2014 08:02	22/01/2014 08:02	
Vine, Darryl G 610626150173 1003989339	12/11/1958 Age: 55	15/01/2014 23:14	21/01/2014 11:40	
Phillips, Susan 610626150173 1003988159	21/05/1967 Age: 46	15/01/2014 15:16	21/01/2014 11:39	
Peters, Daniel 610626150173 1003990732	11/05/1934 Age: 79	16/01/2014 10:18	21/01/2014 09:00	
Jones, Lindsay 610626150173 1003979658	16/07/2000 Age: 13	13/01/2014 17:43	20/01/2014 14:02	
Bret, David G 610626150173 1004009017	11/12/1944 Age: 69	20/01/2014 09:45	20/01/2014 09:45	
Michaels, Susan 610626150173 1004009017	11/12/1944 Age: 69	21/01/2014 09:26	20/01/2014 09:45	
Munchin, Daniel 610626150173 1003978477	02/01/1970 Age: 44	13/01/2014 14:00	18/01/2014 11:40	
Halliday, Daniel 610626150173 1003976995	20/01/1974 Age: 40	13/01/2014 10:18	17/01/2014 10:35	

and any antibiotics dispensed during this admission.

Bluebird		Infection Control Detail			
Special Investigation					
Microbiology					
<input type="button" value="-Hide"/>					
Organism	Infection Type	Start Date	End Date	Ward	HAI
Negative		15/01/2014 21:35	15/01/2014 21:35	gcsec9	
Negative		15/01/2014 21:35	15/01/2014 21:35	gcsec9	
Candida species		15/01/2014 21:35		gcsec9	
Mixed growth contaminants		15/01/2014 21:35		gcsec9	
Candida species		15/01/2014 21:35		gcsec9	
Mixed growth contaminants		15/01/2014 21:35		gcsec9	
Negative		15/01/2014 16:15	15/01/2014 16:15	gcsec9	
Negative		15/01/2014 16:15	15/01/2014 16:15	gcsec9	

Recorded Antibiotics

Documented Allergies: None Recorded

Drug	Indication	Ordered	Started	Stopped	Route	Dose	Frequency	Duration
Ciprofloxacin	Conjunctivitis Acute	13/01/2014 20:08	15/01/2014 08:28		Oral		Not Specified	
Ceftriaxone	Rheumatic Fever	14/01/2014 08:27	14/01/2014 08:56		IV	400mg	2 hourly	3 days

PTO

Over time, hospitals plans to make more information available electronically, and, as that happens, more detail will be available in the discharge summary:

The screenshot shows a patient discharge summary form for Darryl G. Vine. At the top left is a logo with a bar chart and the text "Vine, Darryl G", "1004003434 610626150173", and "Discharged". At the top right is the date "20/08/1956" and "Age: 57 Gender: F". Below this is a section titled "+Patient Information" with a sub-section "Diagnosis/s during this admission" highlighted in red. The "Discharge diagnosis" field is empty. The "Admission Date" is "20/01/2014 08:02" and the "Discharge Date" field is empty. Below are sections for "Recorded Devices", "Theatre Procedures", "Other procedures", "Condition", "Recorded Antibiotics", "Other Drugs", "Destination", "Plan", "Anticipated problems", "Outstanding issues", and "Other Findings", each with a corresponding empty text box. The "Recorded Devices", "Theatre Procedures", and "Recorded Antibiotics" sections contain the text "No procedures were added for this patient during the visit."