

Description

Mr. William A. Jones is a 51 year old white male who presented with a complaint of diarrhea times 3 days. Dr. Nicholas Radon ordered a stool culture test to be performed. A stool specimen for the microbiology test was collected from the patient and sent to the clinical lab at Century Hospital, 2070 Test Park, Los Angeles, CA, 90067, for processing. The stool specimen was analyzed and preliminary result are sent 24 hours later, identifying E. coli O157:H7, Salmonella and Shigella flexneri.

Approximately 48 hours later the Final results, including susceptibility testing of Shigella flexneri are available. The final result report was generated by the LIS and transmitted to the patient's record in the ambulatory EHR used in Dr. Radon's office practice.

Five hours later the laboratorian realizes that the result in the susceptibility suite for Shigella Flexneri were missing results for additional antibiotic.

Comments

This is a variation of a follow up report to LRI_4.1_2.1-NG_FRU

This test case is evaluating the proper use of OBR-22 to establish chronological order of reports and correct use of the status codes in OBR-25 and OBX-11.

Special case test aspects include ensuring that the system can correctly process the data elements for linking parent/child results in accordance with the requirements specified in the implementation guide for the FRN and FRU profiles.

PreCondition

Patient information is pre-loaded in the EHR-S.

and Test case LRI_4.0_1.1-NG AND LRI_4.1_2.1-NG_FRU messages have been received and incorporated.

PostCondition

The test message information received by the EHR-S has been incorporated with the patient's record.

TestObjectives

- Determine if the system can correctly import and incorporate a valid Parent-Child message for an appended Stool Culture/Susceptibility microbiology test report.

Notes to Testers

This is a variation of a follow up report to LRI_4.1_2.1-NG_FRU

Run LRI_4.0_1.1-NG and LRI_4.1_2.1-NG_FRU prior to this test case. This test case requires display verification only.

Concentrate on the following areas:

Check that the parent-child linkage is correctly implemented:

The susceptibility test results are linked to the correct result that spawned the respective susceptibility testing, e.g. once for "Salmonella I, group O:4" and once for "Shigella flexneri", both results of the same parent order (Stool culture).

For the susceptibility test on Shigella flexneri the Result Report Status (OBR-25) changed from F to C - ensure the related results show: additional tests have been appended, i.e. are new:

Result (OBX-5) and interpretation (OBX-8) for "Trimethoprim+Sulfamethoxazole" and "Ciprofloxacin".

Test Case Information

LRI_4.1_4.1-NG_FRU - Culture-Escherichia coli, Salmonella, Shigella - Parent/Child Susceptibility - Correction

Test Case ID

LRI_4.1_4.1-NG_FRU

MSH

Location	Data Element	Data	Categorization
MSH.1	Field Separator		IG Fixed Data
MSH.2	Encoding Characters	~\&	IG Fixed Data
MSH.3	Sending Application		
MSH.3.1	Namespace ID	NIST Test Lab APP	Configurable Data
MSH.4	Sending Facility		
MSH.4.1	Namespace ID	NIST Lab Facility	Configurable Data
MSH.6	Receiving Facility		
MSH.6.1	Namespace ID	NIST EHR Facility	Configurable Data
MSH.7	Date/Time Of Message		
MSH.7.1	Time	20150926140551	System Generated
MSH.9	Message Type		
MSH.9.1	Message Code	ORU	IG Fixed Data
MSH.9.2	Event Type	R01	IG Fixed Data
MSH.9.3	Message Structure	ORU_R01	IG Fixed Data
MSH.10	Message Control ID	LRI_4.1_4.1-NG_FRU	System Generated
MSH.11	Processing ID		
MSH.11.1	Processing ID	D	Changeable Data
MSH.12	VersionID		
MSH.12.1	Version ID	2.5.1	IG Fixed Data
MSH.15	Accept Acknowledgment Type	AL	IG Fixed Data
MSH.16	Application Acknowledgment Type	AL	IG Fixed Data
MSH.21	Message Profile Identifier		
MSH.21.1	Entity Identifier	LRI_Common_Component	IG Fixed Data
MSH.21.3	Universal ID	2.16.840.1.113883.9.16	IG Fixed Data
MSH.21.4	Universal ID Type	ISO	IG Fixed Data
MSH.21[2]	Message Profile Identifier		
MSH.21[2].1	Entity Identifier	LRI_NG_Component	IG Fixed Data
MSH.21[2].3	Universal ID	2.16.840.1.113883.9.13	IG Fixed Data
MSH.21[2].4	Universal ID Type	ISO	IG Fixed Data
MSH.21[3]	Message Profile Identifier		
MSH.21[3].1	Entity Identifier	LRI_FRU_Component	IG Fixed Data
MSH.21[3].3	Universal ID	2.16.840.1.113883.9.83	IG Fixed Data
MSH.21[3].4	Universal ID Type	ISO	IG Fixed Data

PID

Location	Data Element	Data	Categorization
PID.1	Set ID - PID	1	IG Fixed Data
PID.3	Patient Identifier List		
PID.3.1	ID Number	PATID1234	Configurable Data
PID.3.4	Assigning Authority		
PID.3.4.1	Namespace ID	NIST MPI	Changeable Data
PID.3.5	Identifier Type Code	MR	Configurable Data
PID.5	Patient Name		
PID.5.1	Family Name		
PID.5.1.1	Surname	Jones	Changeable Data
PID.5.2	Given Name	William	Changeable Data
PID.5.3	Second and Further Given Names or Initials Thereof	A	Changeable Data
PID.5.7	Name Type Code	L	Changeable Data

PID.7	Location	Date/Time of Birth	Data Element	Data	Categorization
PID.7.1		Time		19610627	Changeable Data
PID.8	Administrative Sex			M	Changeable Data
PID.10	Race				
PID.10.1		Identifier		2106-3	Changeable Data
PID.10.2		Text		White	Changeable Data
PID.10.3		Name of the Coding System		HL70005	Changeable Data
PID.18	Patient Account Number				
PID.18.1		ID Number		PATID1234	Configurable Data
PID.18.4		Assigning Authority			
PID.18.4.1		Namespace ID		NIST MPI	Changeable Data
PID.18.5		Identifier Type Code		AN	Configurable Data

ORC

Location	Data Element	Data	Categorization
ORC.1	Order Control	RE	Test Case Fixed Data
ORC.2	Placer Order Number		
ORC.2.1	Entity Identifier	ORD723222-4	Changeable Data
ORC.2.2	Namespace ID	NIST EHR	Changeable Data
ORC.3	Filler Order Number		
ORC.3.1	Entity Identifier	R-783274-4	Changeable Data
ORC.3.2	Namespace ID	NIST Lab Filler	Changeable Data
ORC.4	Placer Group Number		
ORC.4.1	Entity Identifier	GORD874211	Changeable Data
ORC.4.2	Namespace ID	NIST EHR	Changeable Data
ORC.12	Ordering Provider		
ORC.12.1	ID Number	5742200012	Changeable Data
ORC.12.2	Family Name		
ORC.12.2.1	Surname	Radon	Changeable Data
ORC.12.3	Given Name	Nicholas	Changeable Data
ORC.12.9	Assigning Authority		
ORC.12.9.1	Namespace ID	NPI	Changeable Data
ORC.12.10	Name Type Code	L	Changeable Data
ORC.12.13	Identifier Type Code	NPI	Changeable Data

OBR

Location	Data Element	Data	Categorization
OBR.1	Set ID - OBR	1	IG Fixed Data
OBR.2	Placer Order Number		
OBR.2.1	Entity Identifier	ORD723222-4	Changeable Data
OBR.2.2	Namespace ID	NIST EHR	Changeable Data
OBR.3	Filler Order Number		
OBR.3.1	Entity Identifier	R-783274-4	Changeable Data
OBR.3.2	Namespace ID	NIST Lab Filler	Changeable Data
OBR.4	Universal Service Identifier		
OBR.4.1	Identifier	625-4	Test Case Fixed Data
OBR.4.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBR.4.3	Name of Coding System	LN	Test Case Fixed Data
OBR.4.4	Alternate Identifier	3456543	Changeable Data
OBR.4.5	Alternate Text	CULTURE STOOL	Changeable Data
OBR.4.6	Name of Alternate Coding System	99USL	Changeable Data
OBR.4.7	Coding System Version	2.52	Changeable Data
OBR.4.9	Original Text	Stool Culture	Changeable Data
OBR.7	Observation Date/Time		
OBR.7.1	Time	201509231400	Changeable Data
OBR.16	Ordering Provider		
OBR.16.1	ID Number	5742200012	Changeable Data

OBR.16.2 Location	Family Name Data Element	Data	Categorization
OBR.16.2.1	Surname	Radon	Changeable Data
OBR.16.3	Given Name	Nicholas	Changeable Data
OBR.16.9	Assigning Authority		
OBR.16.9.1	Namespace ID	NPI	Changeable Data
OBR.16.10	Name Type Code	L	Changeable Data
OBR.16.13	Identifier Type Code	NPI	Changeable Data
OBR.22	Results Rpt/Status Chng - Date/Time		
OBR.22.1	Time	20150926140551	Changeable Data
OBR.25	Result Status	F	Test Case Fixed Data
OBR.28	Result Copies To		
OBR.28.1	ID Number	10092000194	Changeable Data
OBR.28.2	Family Name		
OBR.28.2.1	Surname	Hamlin	Changeable Data
OBR.28.3	Given Name	Pafford	Changeable Data
OBR.28.9	Assigning Authority		
OBR.28.9.1	Namespace ID	NPI	Changeable Data
OBR.28.10	Name Type Code	L	Changeable Data
OBR.28.13	Identifier Type Code	NPI	Changeable Data
OBR.47	Filler Supplemental Service Information		
OBR.47.1	Identifier	MIC	Test Case Fixed Data
OBR.47.2	Text	Observation of type microbiology	Test Case Fixed Data
OBR.47.3	Name of the Coding System	HL70411	IG Fixed Data
OBR.47.7	Coding System Version	2.5.1	IG Fixed Data
OBR.49	Results Handling		
OBR.49.1	Identifier	CC	Test Case Fixed Data
OBR.49.2	Text	Copies Requested	Test Case Fixed Data
OBR.49.3	Name of the Coding System	HL70507	IG Fixed Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	1	IG Fixed Data
OBX.2	Value Type	CWE	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	625-4	Test Case Fixed Data
OBX.3.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.3.9	Original Text	Stool Culture	Test Case Fixed Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	1	Changeable Data
OBX.4.3	Sequence	1	Changeable Data
OBX.4.4	Identifier	Islt-1	Changeable Data
OBX.5	Observation Value		
OBX.5.1	Identifier	103429008	Changeable Data
OBX.5.2	Text	Enterohemorrhagic Escherichia coli, serotype O157:H7	Changeable Data
OBX.5.3	Name of the Coding System	SCT	Changeable Data
OBX.5.7	Coding System Version	201509USED	Changeable Data
OBX.5.9	Original Text	Shiga toxin producing E. coli O157:H7 isolated	Changeable Data
OBX.8	Abnormal Flags	A	Test Case Fixed Data
OBX.11	Observation Result Status	F	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		

OBX.19.1	Time	Data Element	201509251930	Data	Changeable Data
Location		Data Element		Data	Categorization
OBX.23		Performing Organization Name			
OBX.23.1		Organization Name	Century Hospital		Changeable Data
OBX.23.6		Assigning Authority			
OBX.23.6.1		Namespace ID	CLIA		Changeable Data
OBX.23.7		Identifier Type Code	XX		Changeable Data
OBX.23.10		Organization Identifier	24D9871327		Changeable Data
OBX.24		Performing Organization Address			
OBX.24.1		Street Address			
OBX.24.1.1		Street or Mailing Address	2070 Test Park		Changeable Data
OBX.24.3		City	Los Angeles		Changeable Data
OBX.24.4		State or Province	CA		Changeable Data
OBX.24.5		Zip or Postal Code	90067		Changeable Data
OBX.24.7		Address Type	B		Changeable Data
OBX.25		Performing Organization Medical Director			
OBX.25.1		ID Number	5432178916		Changeable Data
OBX.25.2		Family Name			
OBX.25.2.1		Surname	Knowsalot		Changeable Data
OBX.25.3		Given Name	Phil		Changeable Data
OBX.25.4		Second and Further Given Names or Initials Thereof	J.		Changeable Data
OBX.25.9		Assigning Authority			
OBX.25.9.1		Namespace ID	NPI		Changeable Data
OBX.25.10		Name Type Code	L		Changeable Data
OBX.25.13		Identifier Type Code	NPI		Changeable Data
OBX.29		Observation Type	RSLT		Test Case Fixed Data

NTE

Location	Data Element	Data	Categorization
NTE.1	Set ID - NTE	1	IG Fixed Data
NTE.3	Comment	Susceptibility testing for E.coli is not performed, because antibiotics should not be used to treat this infection. There is no evidence that treatment with antibiotics is helpful, and taking antibiotics may increase the risk of hemolytic-uremic syndrome (HUS). Antidiarrheal agents like Imodium may also increase that risk. Non-specific supportive therapy, including hydration, is important.	Changeable Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	2	IG Fixed Data
OBX.2	Value Type	CWE	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	625-4	Test Case Fixed Data
OBX.3.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.3.9	Original Text	Stool Culture	Test Case Fixed Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	2	Changeable Data
OBX.4.3	Sequence	1	Changeable Data
OBX.4.4	Identifier	Islt-2	Changeable Data
OBX.5	Observation Value		
OBX.5.1	Identifier	398567006	Changeable Data
OBX.5.2	Text	Salmonella I, group O:4	Changeable Data

OBX.5.3 Location	Name of the Coding System Data Element	SCT Data	Changeable Data Categorization
OBX.5.7	Coding System Version	201509USED	Changeable Data
OBX.5.9	Original Text	Salmonella I, group O:4 isolated	Changeable Data
OBX.8	Abnormal Flags	A	Test Case Fixed Data
OBX.11	Observation Result Status	F	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509251930	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		
OBX.24.1.1	Street or Mailing Address	2070 Test Park	Changeable Data
OBX.24.3	City	Los Angeles	Changeable Data
OBX.24.4	State or Province	CA	Changeable Data
OBX.24.5	Zip or Postal Code	90067	Changeable Data
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data

NTE

Location	Data Element	Data	Categorization
NTE.1	Set ID - NTE	1	IG Fixed Data
NTE.3	Comment	Salmonella gastrointestinal infections usually resolve in 5-7 days and most do not require treatment other than oral fluids. Persons with severe diarrhea may require rehydration with intravenous fluids. Antibiotic therapy can prolong the duration of excretion of non-typhoidal Salmonella and is recommended only for patients with severe illness (e.g., those with severe diarrhea, high fever, bloodstream infection, or who need hospitalization) or those at risk of severe disease or complications, including young infants, older adults (over 65 years old) and immunocompromised persons. Antibiotic resistance is increasing among some Salmonella bacteria; therefore, susceptibility testing can help guide appropriate therapy. Choices for antibiotic therapy for severe infections include fluoroquinolones, third-generation cephalosporins, and ampicillin (for susceptible infections).	Changeable Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	3	IG Fixed Data
OBX.2	Value Type	CWE	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	625-4	Test Case Fixed Data
OBX.3.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.3.9	Original Text	Stool Culture	Test Case Fixed Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	3	Changeable Data
OBX.4.3	Sequence	1	Changeable Data
OBX.4.4	Identifier	Islt-3	Changeable Data
OBX.5	Observation Value		
OBX.5.1	Identifier	85729005	Changeable Data
OBX.5.2	Text	Shigella flexneri	Changeable Data
OBX.5.3	Name of the Coding System	SCT	Changeable Data
OBX.5.7	Coding System Version	201509USED	Changeable Data
OBX.5.9	Original Text	Shigella flexneri isolated	Changeable Data
OBX.8	Abnormal Flags	A	Test Case Fixed Data
OBX.11	Observation Result Status	F	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509251930	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		
OBX.24.1.1	Street or Mailing Address	2070 Test Park	Changeable Data
OBX.24.3	City	Los Angeles	Changeable Data
OBX.24.4	State or Province	CA	Changeable Data
OBX.24.5	Zip or Postal Code	90067	Changeable Data
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data

NTE

Location	Data Element	Data	Categorization
NTE.1	Set ID - NTE	1	IG Fixed Data
		Antibiotic treatment is recommended for patients with severe disease, bloody	

Location	Data Element	Data	Categorization
NTE.3	Comment	diarrhea, or compromised immune systems. Resistance to traditional first-line drugs like ampicillin and trimethoprim-sulfamethoxazole is common, and resistance to some other antibiotics is increasing. With this in mind, antibiotic susceptibility testing can help guide appropriate therapy. When an ampicillin- or trimethoprim-sulfamethoxazole-resistant strain is isolated, choices for therapy include fluoroquinolones, ceftriaxone, and azithromycin.	Changeable Data

SPM

Location	Data Element	Data	Categorization
SPM.1	Set ID - SPM	1	IG Fixed Data
SPM.2	Specimen ID		
SPM.2.1			
SPM.2.1.1		S-2015-66	Configurable Data
SPM.2.1.2		GoodHealthC_EHR	Configurable Data
SPM.2.2			
SPM.2.2.1		S-9911-33	Changeable Data
SPM.2.2.2		NIST Lab Filler	Changeable Data
SPM.4	Specimen Type		
SPM.4.1	Identifier	119339001	Changeable Data
SPM.4.2	Text	Stool specimen	Changeable Data
SPM.4.3	Name of the Coding System	SCT	Changeable Data
SPM.4.7	Coding System Version	201509USED	Changeable Data
SPM.4.9	Original Text	Stool	Changeable Data
SPM.17	Specimen Collection Date/Time		
SPM.17.1	Range Start Date/Time		
SPM.17.1.1	Time	201509231400	Changeable Data

ORC

Location	Data Element	Data	Categorization
ORC.1	Order Control	RE	Test Case Fixed Data
ORC.3	Filler Order Number		
ORC.3.1	Entity Identifier	R-783274-6	Changeable Data
ORC.3.2	Namespace ID	NIST Lab Filler	Changeable Data
ORC.4	Placer Group Number		
ORC.4.1	Entity Identifier	GORD874211	Changeable Data
ORC.4.2	Namespace ID	NIST EHR	Changeable Data
ORC.12	Ordering Provider		
ORC.12.1	ID Number	5742200012	Changeable Data
ORC.12.2	Family Name		
ORC.12.2.1	Surname	Radon	Changeable Data
ORC.12.3	Given Name	Nicholas	Changeable Data
ORC.12.9	Assigning Authority		
ORC.12.9.1	Namespace ID	NPI	Changeable Data
ORC.12.10	Name Type Code	L	Changeable Data
ORC.12.13	Identifier Type Code	NPI	Changeable Data

OBR

Location	Data Element	Data	Categorization
OBR.1	Set ID - OBR	2	IG Fixed Data
OBR.3	Filler Order Number		
OBR.3.1	Entity Identifier	R-783274-6	Changeable Data
OBR.3.2	Namespace ID	NIST Lab Filler	Changeable Data
OBR.4	Universal Service Identifier		
OBR.4.1	Identifier	50545-3	Test Case Fixed Data

Location	Data Element	Data	Categorization
OBR.4.2	Text	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBR.4.3	Name of Coding System	LN	Test Case Fixed Data
OBR.4.7	Coding System Version	2.52	Changeable Data
OBR.4.9	Original Text	Bacteria susceptibility	Changeable Data
OBR.7	Observation Date/Time		
OBR.7.1	Time	201509231400	Changeable Data
OBR.11	Specimen Action Code	G	Test Case Fixed Data
OBR.16	Ordering Provider		
OBR.16.1	ID Number	5742200012	Changeable Data
OBR.16.2	Family Name		
OBR.16.2.1	Surname	Radon	Changeable Data
OBR.16.3	Given Name	Nicholas	Changeable Data
OBR.16.9	Assigning Authority		
OBR.16.9.1	Namespace ID	NPI	Changeable Data
OBR.16.10	Name Type Code	L	Changeable Data
OBR.16.13	Identifier Type Code	NPI	Changeable Data
OBR.22	Results Rpt/Status Chng - Date/Time		
OBR.22.1	Time	20150927112054	Changeable Data
OBR.25	Result Status	F	Test Case Fixed Data
OBR.26	Parent Result		
OBR.26.1	Parent Observation Identifier		
OBR.26.1.1	Identifier	625-4	Test Case Fixed Data
OBR.26.1.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBR.26.1.3	Name of the Coding System	LN	Test Case Fixed Data
OBR.26.1.7	Coding System Version	2.52	Changeable Data
OBR.26.1.9	Original Text	Stool Culture	Changeable Data
OBR.26.2	Parent Observation Sub-Identifier		
OBR.26.2.2	Group	2	Test Case Fixed Data
OBR.26.2.3	Sequence	1	Test Case Fixed Data
OBR.26.2.4	Identifier	Islt-2	Test Case Fixed Data
OBR.28	Result Copies To		
OBR.28.1	ID Number	10092000194	Changeable Data
OBR.28.2	Family Name		
OBR.28.2.1	Surname	Hamlin	Changeable Data
OBR.28.3	Given Name	Pafford	Changeable Data
OBR.28.9	Assigning Authority		
OBR.28.9.1	Namespace ID	NPI	Changeable Data
OBR.28.10	Name Type Code	L	Changeable Data
OBR.28.13	Identifier Type Code	NPI	Changeable Data
OBR.29	Parent		
OBR.29.1	Placer Assigned Identifier		
OBR.29.1.1	Entity Identifier	ORD723222-4	Changeable Data
OBR.29.1.2	Namespace ID	NIST EHR	Changeable Data
OBR.29.2	Filler Assigned Identifier		
OBR.29.2.1	Entity Identifier	R-783274-4	Changeable Data
OBR.29.2.2	Namespace ID	NIST Lab Filler	Changeable Data
OBR.47	Filler Supplemental Service Information		
OBR.47.1	Identifier	MIC	Test Case Fixed Data
OBR.47.2	Text	Observation of type microbiology	Test Case Fixed Data
OBR.47.3	Name of the Coding System	HL70411	IG Fixed Data
OBR.47.7	Coding System Version	2.5.1	IG Fixed Data
OBR.49	Results Handling		
OBR.49.1	Identifier	CC	Test Case Fixed Data
OBR.49.2	Text	Copies Requested	Test Case Fixed Data
OBR.49.3	Name of the Coding System	HL70507	IG Fixed Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	1	IG Fixed Data
OBX.2	Value Type	SN	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	28-1	Test Case Fixed Data
OBX.3.2	Text	Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	1	Test Case Fixed Data
OBX.4.3	Sequence	1	Test Case Fixed Data
OBX.4.4	Identifier	IsIt-2	Test Case Fixed Data
OBX.5	Observation Value		
OBX.5.1	Comparator	<	Test Case Fixed Data
OBX.5.2	Num1	0.06	Test Case Fixed Data
OBX.6	Units		
OBX.6.1	Identifier	ug/mL	Changeable Data
OBX.6.3	Name of the Coding System	UCUM	Changeable Data
OBX.6.7	Coding System Version	1.9	Changeable Data
OBX.8	Abnormal Flags	S	Test Case Fixed Data
OBX.11	Observation Result Status	F	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509261100	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		
OBX.24.1.1	Street or Mailing Address	2070 Test Park	Changeable Data
OBX.24.3	City	Los Angeles	Changeable Data
OBX.24.4	State or Province	CA	Changeable Data
OBX.24.5	Zip or Postal Code	90067	Changeable Data
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data
OBX.30	Observation SubType	SUR	Test Case Fixed Data

OBX

Location	Data Element	Data	Categorization
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OBX.1 Location	Set ID - OBX	Data Element	2 Data	IG Fixed Data	Categorization
OBX.2	Value Type	SN		Test Case Fixed Data	
OBX.3	Observation Identifier				
OBX.3.1	Identifier	267-5		Test Case Fixed Data	
OBX.3.2	Text	Gentamicin [Susceptibility] by Minimum inhibitory concentration (MIC)		Test Case Fixed Data	
OBX.3.3	Name of the Coding System	LN		Test Case Fixed Data	
OBX.3.7	Coding System Version	2.52		Changeable Data	
OBX.4	Observation Sub-ID				
OBX.4.2	Group	1		Test Case Fixed Data	
OBX.4.3	Sequence	1		Test Case Fixed Data	
OBX.4.4	Identifier	IsIt-2		Test Case Fixed Data	
OBX.5	Observation Value				
OBX.5.2	Num1	0.05		Test Case Fixed Data	
OBX.6	Units				
OBX.6.1	Identifier	ug/mL		Changeable Data	
OBX.6.3	Name of the Coding System	UCUM		Changeable Data	
OBX.6.7	Coding System Version	1.9		Changeable Data	
OBX.8	Abnormal Flags	S		Test Case Fixed Data	
OBX.11	Observation Result Status	F		Test Case Fixed Data	
OBX.14	Date/Time of the Observation				
OBX.14.1	Time	201509231400		Changeable Data	
OBX.19	Date/Time of the Analysis				
OBX.19.1	Time	201509261100		Changeable Data	
OBX.23	Performing Organization Name				
OBX.23.1	Organization Name	Century Hospital		Changeable Data	
OBX.23.6	Assigning Authority				
OBX.23.6.1	Namespace ID	CLIA		Changeable Data	
OBX.23.7	Identifier Type Code	XX		Changeable Data	
OBX.23.10	Organization Identifier	24D9871327		Changeable Data	
OBX.24	Performing Organization Address				
OBX.24.1	Street Address				
OBX.24.1.1	Street or Mailing Address	2070 Test Park		Changeable Data	
OBX.24.3	City	Los Angeles		Changeable Data	
OBX.24.4	State or Province	CA		Changeable Data	
OBX.24.5	Zip or Postal Code	90067		Changeable Data	
OBX.24.7	Address Type	B		Changeable Data	
OBX.25	Performing Organization Medical Director				
OBX.25.1	ID Number	5432178916		Changeable Data	
OBX.25.2	Family Name				
OBX.25.2.1	Surname	Knowsalot		Changeable Data	
OBX.25.3	Given Name	Phil		Changeable Data	
OBX.25.4	Second and Further Given Names or Initials Thereof	J.		Changeable Data	
OBX.25.9	Assigning Authority				
OBX.25.9.1	Namespace ID	NPI		Changeable Data	
OBX.25.10	Name Type Code	L		Changeable Data	
OBX.25.13	Identifier Type Code	NPI		Changeable Data	
OBX.29	Observation Type	RSLT		Test Case Fixed Data	
OBX.30	Observation SubType	SUR		Test Case Fixed Data	

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	3	IG Fixed Data
OBX.2	Value Type	SN	Test Case Fixed Data
OBX.3	Observation Identifier		

OBX.3.1 Location	Identifier	Data Element	185-9 Data	Test Case Fixed Data Categorization
OBX.3.2	Text		Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBX.3.3	Name of the Coding System		LN	Test Case Fixed Data
OBX.3.7	Coding System Version		2.52	Changeable Data
OBX.4	Observation Sub-ID			
OBX.4.2	Group		1	Test Case Fixed Data
OBX.4.3	Sequence		1	Test Case Fixed Data
OBX.4.4	Identifier		IsIt-2	Test Case Fixed Data
OBX.5	Observation Value			
OBX.5.2	Num1		0.05	Test Case Fixed Data
OBX.6	Units			
OBX.6.1	Identifier		ug/mL	Changeable Data
OBX.6.3	Name of the Coding System		UCUM	Changeable Data
OBX.6.7	Coding System Version		1.9	Changeable Data
OBX.8	Abnormal Flags		S	Test Case Fixed Data
OBX.11	Observation Result Status		F	Test Case Fixed Data
OBX.14	Date/Time of the Observation			
OBX.14.1	Time		201509231400	Changeable Data
OBX.19	Date/Time of the Analysis			
OBX.19.1	Time		201509261100	Changeable Data
OBX.23	Performing Organization Name			
OBX.23.1	Organization Name		Century Hospital	Changeable Data
OBX.23.6	Assigning Authority			
OBX.23.6.1	Namespace ID		CLIA	Changeable Data
OBX.23.7	Identifier Type Code		XX	Changeable Data
OBX.23.10	Organization Identifier		24D9871327	Changeable Data
OBX.24	Performing Organization Address			
OBX.24.1	Street Address			
OBX.24.1.1	Street or Mailing Address		2070 Test Park	Changeable Data
OBX.24.3	City		Los Angeles	Changeable Data
OBX.24.4	State or Province		CA	Changeable Data
OBX.24.5	Zip or Postal Code		90067	Changeable Data
OBX.24.7	Address Type		B	Changeable Data
OBX.25	Performing Organization Medical Director			
OBX.25.1	ID Number		5432178916	Changeable Data
OBX.25.2	Family Name			
OBX.25.2.1	Surname		Knowsalot	Changeable Data
OBX.25.3	Given Name		Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof		J.	Changeable Data
OBX.25.9	Assigning Authority			
OBX.25.9.1	Namespace ID		NPI	Changeable Data
OBX.25.10	Name Type Code		L	Changeable Data
OBX.25.13	Identifier Type Code		NPI	Changeable Data
OBX.29	Observation Type		RSLT	Test Case Fixed Data
OBX.30	Observation SubType		SUR	Test Case Fixed Data

ORC

Location	Data Element	Data	Categorization
ORC.1	Order Control	RE	Test Case Fixed Data
ORC.3	Filler Order Number		
ORC.3.1	Entity Identifier	R-783274-7	Changeable Data
ORC.3.2	Namespace ID	NIST Lab Filler	Changeable Data
ORC.4	Placer Group Number		
ORC.4.1	Entity Identifier	GORD874211	Changeable Data

Location	Data Element	Data	Categorization
ORC.12	Ordering Provider		
ORC.12.1	ID Number	5742200012	Changeable Data
ORC.12.2	Family Name		
ORC.12.2.1	Surname	Radon	Changeable Data
ORC.12.3	Given Name	Nicholas	Changeable Data
ORC.12.9	Assigning Authority		
ORC.12.9.1	Namespace ID	NPI	Changeable Data
ORC.12.10	Name Type Code	L	Changeable Data
ORC.12.13	Identifier Type Code	NPI	Changeable Data

OBR

Location	Data Element	Data	Categorization
OBR.1	Set ID - OBR	3	IG Fixed Data
OBR.3	Filler Order Number		
OBR.3.1	Entity Identifier	R-783274-7	Changeable Data
OBR.3.2	Namespace ID	NIST Lab Filler	Changeable Data
OBR.4	Universal Service Identifier		
OBR.4.1	Identifier	50545-3	Test Case Fixed Data
OBR.4.2	Text	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBR.4.3	Name of Coding System	LN	Test Case Fixed Data
OBR.4.7	Coding System Version	2.52	Changeable Data
OBR.4.9	Original Text	Bacteria susceptibility	Changeable Data
OBR.7	Observation Date/Time		
OBR.7.1	Time	201509231400	Changeable Data
OBR.11	Specimen Action Code	G	Test Case Fixed Data
OBR.16	Ordering Provider		
OBR.16.1	ID Number	5742200012	Changeable Data
OBR.16.2	Family Name		
OBR.16.2.1	Surname	Radon	Changeable Data
OBR.16.3	Given Name	Nicholas	Changeable Data
OBR.16.9	Assigning Authority		
OBR.16.9.1	Namespace ID	NPI	Changeable Data
OBR.16.10	Name Type Code	L	Changeable Data
OBR.16.13	Identifier Type Code	NPI	Changeable Data
OBR.22	Results Rpt/Status Chng - Date/Time		
OBR.22.1	Time	20150927164251	Changeable Data
OBR.25	Result Status	C	Test Case Fixed Data
OBR.26	Parent Result		
OBR.26.1	Parent Observation Identifier		
OBR.26.1.1	Identifier	625-4	Test Case Fixed Data
OBR.26.1.2	Text	Bacteria identified in Stool by Culture	Test Case Fixed Data
OBR.26.1.3	Name of the Coding System	LN	Test Case Fixed Data
OBR.26.1.7	Coding System Version	2.52	Changeable Data
OBR.26.1.9	Original Text	Stool Culture	Changeable Data
OBR.26.2	Parent Observation Sub-Identifier		
OBR.26.2.2	Group	3	Test Case Fixed Data
OBR.26.2.3	Sequence	1	Test Case Fixed Data
OBR.26.2.4	Identifier	Islt-3	Test Case Fixed Data
OBR.28	Result Copies To		
OBR.28.1	ID Number	10092000194	Changeable Data
OBR.28.2	Family Name		
OBR.28.2.1	Surname	Hamlin	Changeable Data
OBR.28.3	Given Name	Pafford	Changeable Data
OBR.28.9	Assigning Authority		
OBR.28.9.1	Namespace ID	NPI	Changeable Data

OBR.28.10 Location	Name Type Code Data Element	L Data	Changeable Data Categorization
OBR.28.13	Identifier Type Code	NPI	Changeable Data
OBR.29	Parent		
OBR.29.1	Placer Assigned Identifier		
OBR.29.1.1	Entity Identifier	ORD723222-4	Changeable Data
OBR.29.1.2	Namespace ID	NIST EHR	Changeable Data
OBR.29.2	Filler Assigned Identifier		
OBR.29.2.1	Entity Identifier	R-783274-4	Changeable Data
OBR.29.2.2	Namespace ID	NIST Lab Filler	Changeable Data
OBR.47	Filler Supplemental Service Information		
OBR.47.1	Identifier	MIC	Test Case Fixed Data
OBR.47.2	Text	Observation of type microbiology	Test Case Fixed Data
OBR.47.3	Name of the Coding System	HL70411	IG Fixed Data
OBR.47.7	Coding System Version	2.5.1	IG Fixed Data
OBR.49	Results Handling		
OBR.49.1	Identifier	CC	Test Case Fixed Data
OBR.49.2	Text	Copies Requested	Test Case Fixed Data
OBR.49.3	Name of the Coding System	HL70507	IG Fixed Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	1	IG Fixed Data
OBX.2	Value Type	SN	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	28-1	Test Case Fixed Data
OBX.3.2	Text	Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	1	Test Case Fixed Data
OBX.4.3	Sequence	1	Test Case Fixed Data
OBX.4.4	Identifier	Islt-3	Test Case Fixed Data
OBX.5	Observation Value		
OBX.5.1	Comparator	<	Test Case Fixed Data
OBX.5.2	Num1	16	Test Case Fixed Data
OBX.6	Units		
OBX.6.1	Identifier	ug/mL	Changeable Data
OBX.6.3	Name of the Coding System	UCUM	Changeable Data
OBX.6.7	Coding System Version	1.9	Changeable Data
OBX.8	Abnormal Flags	I	Test Case Fixed Data
OBX.11	Observation Result Status	F	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509261100	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		
OBX.24.1.1	Street or Mailing Address	2070 Test Park	Changeable Data
OBX.24.3	City	Los Angeles	Changeable Data

OBX.24.4 Location	State or Province Data Element	CA Data	Changeable Data Categorization
OBX.24.5	Zip or Postal Code	90067	Changeable Data
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data
OBX.30	Observation SubType	SUR	Test Case Fixed Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	2	IG Fixed Data
OBX.2	Value Type	SN	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	516-5	Test Case Fixed Data
OBX.3.2	Text	Trimethoprim+Sulfamethoxazole [Susceptibility] by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	1	Test Case Fixed Data
OBX.4.3	Sequence	1	Test Case Fixed Data
OBX.4.4	Identifier	Isl-3	Test Case Fixed Data
OBX.5	Observation Value		
OBX.5.2	Num1	2	Test Case Fixed Data
OBX.5.3	Separator/Suffix	/	
OBX.5.4	Num2	38	
OBX.6	Units		
OBX.6.1	Identifier	ug/mL	Changeable Data
OBX.6.3	Name of the Coding System	UCUM	Changeable Data
OBX.6.7	Coding System Version	1.9	Changeable Data
OBX.8	Abnormal Flags	S	Test Case Fixed Data
OBX.11	Observation Result Status	B	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509271120	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		
OBX.24.1.1	Street or Mailing Address	2070 Test Park	Changeable Data
OBX.24.3	City	Los Angeles	Changeable Data
OBX.24.4	State or Province	CA	Changeable Data

Location	Data Element	Data	Categorization
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data
OBX.30	Observation SubType	SUR	Test Case Fixed Data

NTE

Location	Data Element	Data	Categorization
NTE.1	Set ID - NTE	1	IG Fixed Data
NTE.3	Comment	Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previous report.	Changeable Data

OBX

Location	Data Element	Data	Categorization
OBX.1	Set ID - OBX	3	IG Fixed Data
OBX.2	Value Type	SN	Test Case Fixed Data
OBX.3	Observation Identifier		
OBX.3.1	Identifier	185-9	Test Case Fixed Data
OBX.3.2	Text	Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	Test Case Fixed Data
OBX.3.3	Name of the Coding System	LN	Test Case Fixed Data
OBX.3.7	Coding System Version	2.52	Changeable Data
OBX.4	Observation Sub-ID		
OBX.4.2	Group	1	Test Case Fixed Data
OBX.4.3	Sequence	1	Test Case Fixed Data
OBX.4.4	Identifier	Islt-3	Test Case Fixed Data
OBX.5	Observation Value		
OBX.5.2	Num1	0.05	Test Case Fixed Data
OBX.6	Units		
OBX.6.1	Identifier	ug/mL	Changeable Data
OBX.6.3	Name of the Coding System	UCUM	Changeable Data
OBX.6.7	Coding System Version	1.9	Changeable Data
OBX.8	Abnormal Flags	S	Test Case Fixed Data
OBX.11	Observation Result Status	B	Test Case Fixed Data
OBX.14	Date/Time of the Observation		
OBX.14.1	Time	201509231400	Changeable Data
OBX.19	Date/Time of the Analysis		
OBX.19.1	Time	201509271120	Changeable Data
OBX.23	Performing Organization Name		
OBX.23.1	Organization Name	Century Hospital	Changeable Data
OBX.23.6	Assigning Authority		
OBX.23.6.1	Namespace ID	CLIA	Changeable Data
OBX.23.7	Identifier Type Code	XX	Changeable Data
OBX.23.10	Organization Identifier	24D9871327	Changeable Data
OBX.24	Performing Organization Address		
OBX.24.1	Street Address		

OBX.24.1.1 Location	Street or Mailing Address Data Element	2070 Test Park Data	Changeable Data Categorization
OBX.24.3	City	Los Angeles	Changeable Data
OBX.24.4	State or Province	CA	Changeable Data
OBX.24.5	Zip or Postal Code	90067	Changeable Data
OBX.24.7	Address Type	B	Changeable Data
OBX.25	Performing Organization Medical Director		
OBX.25.1	ID Number	5432178916	Changeable Data
OBX.25.2	Family Name		
OBX.25.2.1	Surname	Knowsalot	Changeable Data
OBX.25.3	Given Name	Phil	Changeable Data
OBX.25.4	Second and Further Given Names or Initials Thereof	J.	Changeable Data
OBX.25.9	Assigning Authority		
OBX.25.9.1	Namespace ID	NPI	Changeable Data
OBX.25.10	Name Type Code	L	Changeable Data
OBX.25.13	Identifier Type Code	NPI	Changeable Data
OBX.29	Observation Type	RSLT	Test Case Fixed Data
OBX.30	Observation SubType	SUR	Test Case Fixed Data

NTE

Location	Data Element	Data	Categorization
NTE.1	Set ID - NTE	1	IG Fixed Data
NTE.3	Comment	Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previous report.	Changeable Data

Patient Information

Element	Data
Name	William A Jones
Date/Time of Birth	06/27/1961
Administrative Sex	Male
Race	White
Alt Race	

Order Observation[*]**Order Observation****Ordering Provider**

Element	Data
Name	Nicholas Radon
Identifier number	5742200012

Observation Details

Element	Data
Observation General Information	
Placer Order Number	ORD723222-4
Filler Order Number	R-783274-4
Placer Group Number	GORD874211
Parent Universal Service Identifier	
Identifier	
Text	
Alt Identifier	
Alt Text	
Original Text	
Observation Details	
Universal Service Identifier	Bacteria identified in Stool by Culture
Observation Date/Time	09/23/2015 2:00 PM
Observation end Date/Time	
Specimen Action Code	
Relevant Clinical Information	
Relevant Clinical Information Original Text	
Observation Result Information	
Result Status	F
Results Report/Status Change - Date/Time	09/26/2015 2:05 PM
Results Copy To	
Name	Pafford
Identifier	10092000194
Results Handling	
Standard	
Observation Notes	

Timing/Quantity Information

Element	Data
Priority	
Start Date/time	
End Date/time	

Results Performing Laboratory

Element	Data
Laboratory Name	Century Hospital
Organization identifier	24D9871327
Address	2070 Test Park Los Angeles CA 90067
Director Name	Phil J. Knowsalot
Director identifier	5432178916

Specimen Information

Element	Data
Specimen Type	Stool specimen
Alt Specimen Type	
Specimen Original Text	Stool
Start date/time	201509231400

Lab results

Element				Data					
Test performed				Stool Culture					
Test Report date				09/26/2015 14:05					
Result Observation Name	Result	UOM	Range	Abnormal Flag	Status	Date/Time of Observation	Date/Time of Analysis	Notes	

Stool Culture	Shiga toxin producing E. coli O157:H7 isolated			A	F	09/23/2015 14:00	09/25/2015 19:30	<p>Susceptibility testing for E.coli is not performed, because antibiotics should not be used to treat this infection. There is no evidence that treatment with antibiotics is helpful, and taking antibiotics may increase the risk of hemolytic-uremic syndrome (HUS). Antidiarrheal agents like Imodium may also increase that risk. Non-specific supportive therapy, including hydration, is important.</p>
								<p>Salmonella gastrointestinal infections usually resolve in 5-7 days and most do not require treatment other than oral fluids. Persons with severe diarrhea may require rehydration with intravenous fluids. Antibiotic therapy can prolong the duration of excretion of non-typhoidal Salmonella and is recommended only for</p>

Stool Culture	Salmonella I, group O:4 isolated		A	F	09/23/2015 14:00	09/25/2015 19:30	<p>patients with severe illness (e.g., those with severe diarrhea, high fever, bloodstream infection, or who need hospitalization) or those at risk of severe disease or complications, including young infants, older adults (over 65 years old) and immunocompromised persons. Antibiotic resistance is increasing among some Salmonella bacteria; therefore, susceptibility testing can help guide appropriate therapy. Choices for antibiotic therapy for severe infections include fluoroquinolones, third-generation cephalosporins, and ampicillin (for susceptible infections).</p>
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Stool Culture	Shigella flexneri isolated			A	F	09/23/2015 14:00	09/25/2015 19:30	Antibiotic treatment is recommended for patients with severe disease, bloody diarrhea, or compromised immune systems. Resistance to traditional first-line drugs like ampicillin and trimethoprim-sulfamethoxazole is common, and resistance to some other antibiotics is increasing. With this in mind, antibiotic susceptibility testing can help guide appropriate therapy. When an ampicillin- or trimethoprim-sulfamethoxazole-resistant strain is isolated, choices for therapy include fluoroquinolones, ceftriaxone, and azithromycin.
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Order Observation

Ordering Provider

Element	Data
Name	Nicholas Radon
Identifier number	5742200012

Observation Details

Element	Data
Observation General Information	
Placer Order Number	
Filler Order Number	R-783274-6
Placer Group Number	GORD874211

Parent Universal Service Identifier	
Identifier	
Text	
Alt Identifier	
Alt Text	
Original Text	
Observation Details	
Universal Service Identifier	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)
Observation Date/Time	09/23/2015 2:00 PM
Observation end Date/Time	
Specimen Action Code	G
Relevant Clinical Information	
Relevant Clinical Information Original Text	
Observation Result Information	
Result Status	F
Results Report/Status Change - Date/Time	09/27/2015 11:20 AM
Results Copy To	
Name	Pafford
Identifier	10092000194
Results Handling	
Standard	
Observation Notes	

Timing/Quantity Information

Element	Data
Priority	
Start Date/time	
End Date/time	

Results Performing Laboratory

Element	Data
Laboratory Name	Century Hospital
Organization identifier	24D9871327
Address	2070 Test Park Los Angeles CA 90067
Director Name	Phil J. Knowsalot
Director identifier	5432178916

Lab results

Element		Data						
Test performed		Bacteria susceptibility						
Test Report date		09/27/2015 11:20						
Result Observation Name	Result	UOM	Range	Abnormal Flag	Status	Date/Time of Observation	Date/Time of Analysis	Notes

Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	< 0.06	ug/mL		S	F	09/23/2015 14:00	09/26/2015 11:00	
Gentamicin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05	ug/mL		S	F	09/23/2015 14:00	09/26/2015 11:00	
Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05	ug/mL		S	F	09/23/2015 14:00	09/26/2015 11:00	

Order Observation

Ordering Provider

Element	Data
Name	Nicholas Radon
Identifier number	5742200012

Observation Details

Element	Data
Observation General Information	
Placer Order Number	
Filler Order Number	R-783274-7
Placer Group Number	GORD874211
Parent Universal Service Identifier	
Identifier	
Text	
Alt Identifier	
Alt Text	
Original Text	
Observation Details	
Universal Service Identifier	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)
Observation Date/Time	09/23/2015 2:00 PM
Observation end Date/Time	
Specimen Action Code	G
Relevant Clinical Information	
Relevant Clinical Information Original Text	
Observation Result Information	
Result Status	C
Results Report/Status Change - Date/Time	09/27/2015 4:42 PM
Results Copy To	
Name	Pafford

Identifier	10092000194
Results Handling	
Standard	
Observation Notes	

Timing/Quantity Information

Element	Data
Priority	
Start Date/time	
End Date/time	

Results Performing Laboratory

Element	Data
Laboratory Name	Century Hospital
Organization identifier	24D9871327
Address	2070 Test Park Los Angeles CA 90067
Director Name	Phil J. Knowsalot
Director identifier	5432178916

Lab results

Element		Data						
Test performed		Bacteria susceptibility						
Test Report date		09/27/2015 16:42						
Result Observation Name	Result	UOM	Range	Abnormal Flag	Status	Date/Time of Observation	Date/Time of Analysis	Notes
Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	< 16	ug/mL		I	F	09/23/2015 14:00	09/26/2015 11:00	
Trimethoprim+Sulfamethoxazole [Susceptibility] by Minimum inhibitory concentration (MIC)	2 / 38	ug/mL		S	B	09/23/2015 14:00	09/27/2015 11:20	Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previous report.
Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05	ug/mL		S	B	09/23/2015 14:00	09/27/2015 11:20	Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previous report.



HL7 v2.5 ORU^R01^ORU_R01 Message: Incorporation of Laboratory Results		
Test Case ID	LRI_4.1_4.1-NG_FRU	
Juror ID		
Juror Name		
HIT System Tested		
Inspection Date/Time		
Inspection Settlement (Pass/Fail)	Pass	Fail
	<input type="checkbox"/>	<input type="checkbox"/>
Reason Failed		
Juror Comments		

This Test Case-specific Juror Document provides a checklist for the Tester to use during testing for assessing the Health IT Module's ability to display and incorporate required data elements from the information received in the LRI message. Additional data from the message or from the Health IT Module are permitted to be displayed and incorporated by the Module. Grayed-out fields in the Juror Document indicate where no data for that data element were included in the LRI message for the given Test Case.

The format of the Display Verification section of this Juror Document is for ease-of-use by the Tester and does not indicate how the Health IT Module display must be designed.

Display Verification

Legend for Display Requirement

Data in **bold red** text: HIT Module must display exact version of stored data

Data in ***bold black italics*** text: HIT Module must display exact version of data received in the LRI message

Data in regular text: HIT Module may display equivalent version of stored data

Patient Information - Display Verification					
Patient Identifier	Patient Name	DOB	Sex	Race	Tester Comment
<i>PATID1234</i>	<i>William A Jones</i>	06/27/1961	M	White	
When a given patient has more than one Patient ID Number, the HIT module may display the ID Number that is most appropriate for the context (e.g., inpatient ID Number versus ambulatory ID Number.)					

Lab Results - Display Verification									
Test Performed:	Stool Culture								
Test Report Date:	09/26/2015 14:05:51								
Result Report Status	F								
Result Observation Name	Result Value	UOM	Reference Range	Abnormal Flag	Status	Date/Time of Observation	End Date/Time of Observation	Date/Time of Analysis	Tester Comment
Stool Culture	Shiga toxin producing E. coli O157:H7 isolated			A	F	09/23/2015 14:00:		09/25/2015 19:30:	
Note	Susceptibility testing for E.coli is not performed, because antibiotics should not be used to treat this infection. There is no evidence that treatment with antibiotics is helpful, and taking antibiotics may increase the risk of hemolytic-uremic syndrome (HUS). Antidiarrheal agents like Imodium may also increase that risk. Non-specific supportive therapy, including hydration, is important.								

Lab Results - Display Verification									
Test Performed:	Stool Culture								
Test Report Date:	09/26/2015 14:05:51								
Result Report Status	F								
Result Observation Name	Result Value	UOM	Reference Range	Abnormal Flag	Status	Date/Time of Observation	End Date/Time of Observation	Date/Time of Analysis	Tester Comment
Stool Culture	Salmonella I, group O:4 isolated			A	F	09/23/2015 14:00:		09/25/2015 19:30:	
Note	Salmonella gastrointestinal infections usually resolve in 5-7 days and most do not require treatment other than oral fluids. Persons with severe diarrhea may require rehydration with intravenous fluids. Antibiotic therapy can prolong the duration of excretion of non-typhoidal Salmonella and is recommended only for patients with severe illness (e.g., those with severe diarrhea, high fever, bloodstream infection, or who need hospitalization) or those at risk of severe disease or complications, including young infants, older adults (over 65 years old) and immunocompromised persons. Antibiotic resistance is increasing among some Salmonella bacteria; therefore, susceptibility testing can help guide appropriate therapy. Choices for antibiotic therapy for severe infections include fluoroquinolones, third-generation cephalosporins, and ampicillin (for susceptible infections).								
Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	< 0.06			S	F	09/23/2015 14:00:		09/26/2015 11:00:	
Gentamicin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05			S	F	09/23/2015 14:00:		09/26/2015 11:00:	
Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05			S	F	09/23/2015 14:00:		09/26/2015 11:00:	

Lab Results - Display Verification									
Test Performed:	Stool Culture								
Test Report Date:	09/26/2015 14:05:51								
Result Report Status	F								
Result Observation Name	Result Value	UOM	Reference Range	Abnormal Flag	Status	Date/Time of Observation	End Date/Time of Observation	Date/Time of Analysis	Tester Comment
Stool Culture	Shigella flexneri isolated			A	F	09/23/2015 14:00:		09/25/2015 19:30:	
Note	Antibiotic treatment is recommended for patients with severe disease, bloody diarrhea, or compromised immune systems. Resistance to traditional first-line drugs like ampicillin and trimethoprim-sulfamethoxazole is common, and resistance to some other antibiotics is increasing. With this in mind, antibiotic susceptibility testing can help guide appropriate therapy. When an ampicillin- or trimethoprim-sulfamethoxazole-resistant strain is isolated, choices for therapy include fluoroquinolones, ceftriaxone, and azithromycin.								
Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	< 16			I	F			09/26/2015 11:00:	
Trimethoprim+Sulfamethoxazole [Susceptibility] by Minimum inhibitory concentration (MIC)	2 / 38			S	B			09/27/2015 11:20:	
Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	0.05			S	B			09/27/2015 11:20:	

Performing Organization Information - Display Verification		
Data Element Name	Data	Tester Comment
Organization Name	Century Hospital	
Organization Address		
Street address	2070 Test Park	
Other designation		
City	Los Angeles	
State	CA	
Zip code	90067	

Performing Organization Medical Director Information - Display Verification		
Data Element Name	Data	Tester Comment
Medical Director Name		
Family Name		
Surname	Knowsalot	
Given Name	Phil	
Second and Further Given Names or Initials Thereof	J.	
Suffix (e.g., JR or III)		
Prefix (e.g., DR)		

Specimen Information - Display Verification		
Data Element Name	Data	Tester Comment
Specimen Type(Specimen Source)	Stool	
Specimen Collection Date/Time - Start	09/23/2015 14:00:	
Specimen Collection Date/Time - End		
Specimen Reject Reason		
Specimen Condition		

Order Information - Display Verification		
Data Element Name	Data	Tester Comment
Relevant Clinical Information		
Placer Order Number Entity ID	ORD723222-4	
Ordering Provider		
Family Name		
Surname	Radon	
Given Name	Nicholas	
Second and Further Given Names or Initials Thereof		
Suffix (e.g., JR or III)		
Prefix (e.g., DR)		
Results Copies To		
Family Name		
Surname	Hamlin	
Given Name	Pafford	
Second and Further Given Names or Initials Thereof		
Suffix (e.g., JR or III)		
Prefix (e.g., DR)		

Incorporate Verification

Legend for Store Requirement

S-EX : Store exact

S-TR-R : Translate and store translation (exact value can be re-created from translation any time)

S-EX-A : Store exact by association

S-RC : Process and re-create

S-EQ : Store equivalent

(See "Instructions to Testers for Verification of Store Requirements" at the end of this Juror Document for additional details.)

Patient Information Details- Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
PID-3	Patient Identifier List			
PID-3.1	ID Number	S-EX-A	PATID1234	
PID-3.4	Assigning Property			
PID-3.4.1	Namespace ID	S-EX-A	NIST MPI	
PID-3.4.2	Universal ID	S-EX-A		
PID-3.4.3	Universal ID Type	S-EX-A		
PID-3.5	Identifier Type Code	S-RC	MR	
PID-5	Patient Name			
PID-5.1	Family Name			
PID-5.1.1	Surname	S-EX-A	Jones	
PID-5.2	Given Name	S-EX-A	William	
PID-5.3	Second and Further Given Names or Initials Thereof	S-EX-A	A	
PID-5.4	Suffix (e.g., JR or III)	S-EX-A		
PID-5.7	Name Type Code	S-RC	L	
PID-7	Date/Time of Birth			
PID-7.1	Time	S-EQ	06/27/1961	
PID-8	Administrative Sex	S-TR-R	M	
PID-10	Race			
PID-10.1	Identifier	S-RC	2106-3	
PID-10.2	Text	S-RC	White	
PID-10.3	Name of Coding System	S-RC	HL70005	

Order Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
ORC-2/OBR-2	Placer Order Number			
ORC-2.1/OBR-2.1	Entity Identifier	S-EX-A	ORD723222-4	
ORC-2.2/OBR-2.2	Namespace ID	S-EX-A	NIST EHR	
ORC-2.3/OBR-2.3	Universal ID	S-EX-A		
ORC-2.4/OBR-2.4	Universal ID Type	S-EX-A		
ORC-3/OBR-3	Filler Order Number			
ORC-3.1/OBR-3.1	Entity Identifier	S-EX	R-783274-4	
ORC-3.2/OBR-3.2	Namespace ID	S-EX-A	NIST Lab Filler	
ORC-3.3/OBR-3.3	Universal ID	S-EX-A		
ORC-3.4/OBR-3.4	Universal ID Type	S-EX-A		
ORC-12/OBR-16	Ordering Provider			
ORC-12.1/OBR-16.1	ID Number	S-RC	5742200012	
ORC-12.2/OBR-16.2	Family Name			
ORC-12.2.1/OBR-16.2.1	Surname	S-RC	Radon	
ORC-12.3/OBR-16.3	Given Name	S-RC	Nicholas	
ORC-12.4/OBR-16.4	Second and Further Given Names or Initials Thereof	S-RC		
ORC-12.5/OBR-16.5	Suffix (e.g., JR or III)	S-RC		
ORC-12.6/OBR-16.6	Prefix (e.g., DR)	S-RC		
ORC-12.9/OBR-16.9	Assigning Authority			
ORC-12.9.1/OBR-16.9.1	Namespace ID	S-EX-A	NPI	
ORC-12.9.2/OBR-16.9.2	Universal ID	S-EX-A		
ORC-12.9.3/OBR-16.9.3	Universal ID Type	S-EX-A		
ORC-12.10/OBR-16.10	Name Type Code	S-RC	L	
ORC-12.13/OBR-16.13	Identifier Type Code	S-RC	NPI	

Performing Organization Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-23	Performing Organization Name			
OBX-23.1	Organization Name (Note 1)	S-TR-R	Century Hospital	
OBX-23.6	Assigning Authority (Note 2)			
OBX-23.6.1	Namespace ID	S-EX-A	CLIA	
OBX-23.6.2	Universal ID	S-EX-A		
OBX-23.6.3	Universal ID Type	S-EX-A		
OBX-23.7	Identifier Type Code	S-RC	XX	
OBX-23.10	Organization Identifier	S-TR-R	24D9871327	
OBX-24	Performing Organization Address			
OBX-24.1	Street Address			
OBX-24.1.1	Street or Mailing Address	S-EX-A	2070 Test Park	
OBX-24.2	Other Designation	S-EX-A		
OBX-24.3	City	S-EX-A	Los Angeles	
OBX-24.4	State or Province	S-EX-A	CA	
OBX-24.5	Zip or Postal Code	S-EX-A	90067	
OBX-24.6	Country	S-TR-R		
OBX-25	Performing Organization Medical Director			
OBX-25.1	ID Number	S-RC	5432178916	
OBX-25.2	Family Name			
OBX-25.2.1	Surname	S-TR-R	Knowsalot	
OBX-25.3	Given Name	S-TR-R	Phil	
OBX-25.4	Second and Further Given Names or Initials Thereof	S-TR-R	J.	
OBX-25.5	Suffix (e.g., JR or III)	S-TR-R		
OBX-25.6	Prefix (e.g., DR)	S-TR-R		
OBX-25.9	Assigning Authority (Note 2)			
OBX-25.9.1	Namespace ID	S-EX-A	NPI	
OBX-25.9.2	Universal ID	S-EX-A		
OBX-25.9.3	Universal ID Type	S-EX-A		
OBX-25.10	Name Type Code	S-RC	L	
OBX-25.13	Identifier Type Code	S-RC	NPI	
Note 1 - The HIT Module must store the Organization Name or be able to recreate it. If the HIT Module is able to demonstrate Organization Name: ID is always 1:1, then the HIT Module is permitted to store and recreate (S-TR-R).				
Note 2 - Determine requirement for support of 2nd component or 3rd and 4th component based on the EI or HD Profile				

Order Information (cont'd) Parent Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBR-4	Universal Service Identifier (Note 1)			
OBR-4.1	Identifier	S-TR-R	625-4	
OBR-4.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBR-4.3	Name of the Coding System	S-RC	LN	
OBR-4.4	Alternate Identifier	S-TR-R	3456543	
OBR-4.5	Alternate Text	S-EX-A	CULTURE STOOL	
OBR-4.6	Name of Alternate Coding System	S-RC	99USL	
OBR-4.9	Original Text	S-EX	Stool Culture	
OBR-7/SPM-17.1	Observation Date/Time			
OBR-7.1/SPM-17.1.1	Time	S-EQ	09/23/2015 14:00:	
OBR-8/SPM-17.2	Observation End Date/Time			
OBR-8.1/SPM-17.2.1	Time	S-EQ		
OBR-13	Relevant Clinical Information			
OBR-13.1	Identifier	S-TR-R		
OBR-13.2	Text	S-EX-A		
OBR-13.3	Name of the Coding System	S-RC		
OBR-13.9	Original Text	S-EX		
OBR-22	Results Rpt/Status Chng - Date/Time			
OBR-22.1	Time	S-EQ	09/26/2015 14:05:51	
OBR-25	Result Status	S-TR-R	F	
OBR-28	Result Copies To			
OBR-28.1	ID Number	S-RC	10092000194	
OBR-28.2	Family Name			
OBR-28.2.1	Surname	S-EX-A	Hamlin	
OBR-28.3	Given Name	S-EX-A	Pafford	
OBR-28.4	Second and Further Given Names or Initials Thereof	S-EX-A		
OBR-28.5	Suffix (e.g., JR or III)	S-EX-A		
OBR-28.6	Prefix (e.g., DR)	S-EX-A		
OBR-28.9	Assigning Authority			
OBR-28.9.1	Namespace ID	S-EX-A	NPI	
OBR-28.9.2	Universal ID	S-EX-A		
OBR-28.9.3	Universal ID Type	S-EX-A		
OBR-28.10	Name Type Code	S-TR-R	L	
OBR-28.13	Identifier Type Code	S-RC	NPI	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				

Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	625-4	
OBX-3.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX	Stool Culture	
OBX-5	Observation Value			
OBX-5.1	Identifier	S-TR-R	103429008	
OBX-5.2	Text	S-EX-A	Enterohemorrhagic Escherichia coli, serotype O157:H7	
OBX-5.3	Name of the Coding System	S-RC	SCT	
OBX-5.4	Alternate Identifier	S-TR-R		
OBX-5.5	Alternate Text	S-EX-A		
OBX-5.6	Name of Alternate Coding System	S-RC		
OBX-5.9	Original Text	S-EX	Shiga toxin producing E. coli O157:H7 isolated	
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R		
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC		
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	A	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/25/2015 19:30:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Note - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
NTE-3	Note	S-EX	Susceptibility testing for E.coli is not performed, because antibiotics should not be used to treat this infection. There is no evidence that treatment with antibiotics is helpful, and taking antibiotics may increase the risk of hemolytic-uremic syndrome (HUS). Antidiarrheal agents like Imodium may also increase that risk. Non-specific supportive therapy, including hydration, is important.	

PARENT - 2

Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	625-4	
OBX-3.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX	Stool Culture	
OBX-5	Observation Value			
OBX-5.1	Identifier	S-TR-R	398567006	
OBX-5.2	Text	S-EX-A	Salmonella I, group O:4	
OBX-5.3	Name of the Coding System	S-RC	SCT	
OBX-5.4	Alternate Identifier	S-TR-R		
OBX-5.5	Alternate Text	S-EX-A		
OBX-5.6	Name of Alternate Coding System	S-RC		
OBX-5.9	Original Text	S-EX	Salmonella I, group O:4 isolated	
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R		
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC		
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	A	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/25/2015 19:30:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Note - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
NTE-3	Note	S-EX	Salmonella gastrointestinal infections usually resolve in 5-7 days and most do not require treatment other than oral fluids. Persons with severe diarrhea may require rehydration with intravenous fluids. Antibiotic therapy can prolong the duration of excretion of non-typhoidal Salmonella and is recommended only for patients with severe illness (e.g., those with severe diarrhea, high fever, bloodstream infection, or who need hospitalization) or those at risk of severe disease or complications, including young infants, older adults (over 65 years old) and immunocompromised persons. Antibiotic resistance is increasing among some Salmonella bacteria; therefore, susceptibility testing can help guide appropriate therapy. Choices for antibiotic therapy for severe infections include fluoroquinolones, third-generation cephalosporins, and ampicillin (for susceptible infections).	

Order Information (cont'd) Child Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
ORC-3/OBR-3	Filler Order Number			
ORC-3.1/OBR-3.1	Entity Identifier	S-EX	R-783274-6	
ORC-3.2/OBR-3.2	Namespace ID	S-EX-A	NIST Lab Filler	
ORC-3.3/OBR-3.3	Universal ID	S-EX-A		
ORC-3.4/OBR-3.4	Universal ID Type	S-EX-A		
OBR-4	Universal Service Identifier (Note 1)			
OBR-4.1	Identifier	S-TR-R	50545-3	
OBR-4.2	Text	S-EX-A	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)	
OBR-4.3	Name of the Coding System	S-RC	LN	
OBR-4.4	Alternate Identifier	S-TR-R		
OBR-4.5	Alternate Text	S-EX-A		
OBR-4.6	Name of Alternate Coding System	S-RC		

Order Information (cont'd) Child Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBR-4.9	Original Text	S-EX	Bacteria susceptibility	
OBR-26	Parent Result			
OBR-26.1	Parent Observation Identifier (Note 2)			
OBR-26.1.1	Identifier	S-EX-A	625-4	
OBR-26.1.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBR-26.1.3	Name of the Coding System	S-EX-A	LN	
OBR-26.1.4	Alternate Identifier	S-EX-A		
OBR-26.1.5	Alternate Text	S-EX-A		
OBR-26.1.6	Name of Alternate Coding System	S-EX-A		
OBR-26.2	Parent Observation Sub-Identifier			
OBR-26.2.2	Group	S-EX-A	2	
OBR-26.2.3	Sequence	S-EX-A	1	
OBR-26.2.4	Identifier	S-EX-A	IsIt-2	
OBR-29	Parent (Note 2)			
OBR-29.1	Placer Assigned Identifier			
OBR-29.1.1	Entity Identifier	S-EX-A	ORD723222-4	
OBR-29.1.2	Namespace ID	S-EX-A	NIST EHR	
OBR-29.1.3	Universal ID	S-EX-A		
OBR-29.1.4	Universal ID Type	S-EX-A		
OBR-29.2	Filler Assigned Identifier			
OBR-29.2.1	Entity Identifier	S-EX-A	R-783274-4	
OBR-29.2.2	Namespace ID	S-EX-A	NIST Lab Filler	
OBR-29.2.3	Universal ID	S-EX-A		
OBR-29.2.4	Universal ID Type	S-EX-A		
Note 1 -Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - The HIT Module must display the relationship to the parent, but is not required to store the actual received data when the association to a specific result is achieved, otherwise use S-EX to save the information.				

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Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	28-1	
OBX-3.2	Text	S-EX-A	Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX		
OBX-5	Observation Value			
OBX-5.1	Comparator	S-EX	<	
OBX-5.2	Num1	S-EQ	0.06	
OBX-5.3	Separator/Suffix	S-EX		
OBX-5.4	Num2	S-EQ		
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R	ug/mL	
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC	UCUM	
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	S	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/26/2015 11:00:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	267-5	
OBX-3.2	Text	S-EX-A	Gentamicin [Susceptibility] by Minimum inhibitory concentration (MIC)	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX		
OBX-5	Observation Value			
OBX-5.1	Comparator	S-EX		
OBX-5.2	Num1	S-EQ	0.05	
OBX-5.3	Separator/Suffix	S-EX		
OBX-5.4	Num2	S-EQ		
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R	ug/mL	
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC	UCUM	
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	S	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/26/2015 11:00:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	185-9	
OBX-3.2	Text	S-EX-A	Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX		
OBX-5	Observation Value			
OBX-5.1	Comparator	S-EX		
OBX-5.2	Num1	S-EQ	0.05	
OBX-5.3	Separator/Suffix	S-EX		
OBX-5.4	Num2	S-EQ		
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R	ug/mL	
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC	UCUM	
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	S	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/26/2015 11:00:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	625-4	
OBX-3.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX	Stool Culture	
OBX-5	Observation Value			
OBX-5.1	Identifier	S-TR-R	85729005	
OBX-5.2	Text	S-EX-A	Shigella flexneri	
OBX-5.3	Name of the Coding System	S-RC	SCT	
OBX-5.4	Alternate Identifier	S-TR-R		
OBX-5.5	Alternate Text	S-EX-A		
OBX-5.6	Name of Alternate Coding System	S-RC		
OBX-5.9	Original Text	S-EX	Shigella flexneri isolated	
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R		
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC		
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	A	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/25/2015 19:30:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Note - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
NTE-3	Note	S-EX	Antibiotic treatment is recommended for patients with severe disease, bloody diarrhea, or compromised immune systems. Resistance to traditional first-line drugs like ampicillin and trimethoprim-sulfamethoxazole is common, and resistance to some other antibiotics is increasing. With this in mind, antibiotic susceptibility testing can help guide appropriate therapy. When an ampicillin- or trimethoprim-sulfamethoxazole-resistant strain is isolated, choices for therapy include fluoroquinolones, ceftriaxone, and azithromycin.	

Order Information (cont'd) Child Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
ORC-3/OBR-3	Filler Order Number			
ORC-3.1/OBR-3.1	Entity Identifier	S-EX	R-783274-7	
ORC-3.2/OBR-3.2	Namespace ID	S-EX-A	NIST Lab Filler	
ORC-3.3/OBR-3.3	Universal ID	S-EX-A		
ORC-3.4/OBR-3.4	Universal ID Type	S-EX-A		
OBR-4	Universal Service Identifier (Note 1)			
OBR-4.1	Identifier	S-TR-R	50545-3	
OBR-4.2	Text	S-EX-A	Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)	
OBR-4.3	Name of the Coding System	S-RC	LN	
OBR-4.4	Alternate Identifier	S-TR-R		
OBR-4.5	Alternate Text	S-EX-A		
OBR-4.6	Name of Alternate Coding System	S-RC		
OBR-4.9	Original Text	S-EX	Bacteria susceptibility	
OBR-26	Parent Result			
OBR-26.1	Parent Observation Identifier (Note 2)			
OBR-26.1.1	Identifier	S-EX-A	625-4	
OBR-26.1.2	Text	S-EX-A	Bacteria identified in Stool by Culture	
OBR-26.1.3	Name of the Coding System	S-EX-A	LN	
OBR-26.1.4	Alternate Identifier	S-EX-A		

Order Information (cont'd) Child Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBR-26.1.5	Alternate Text	S-EX-A		
OBR-26.1.6	Name of Alternate Coding System	S-EX-A		
OBR-26.2	Parent Observation Sub-Identifier			
OBR-26.2.2	Group	S-EX-A	3	
OBR-26.2.3	Sequence	S-EX-A	1	
OBR-26.2.4	Identifier	S-EX-A	IsIt-3	
OBR-29	Parent (Note 2)			
OBR-29.1	Placer Assigned Identifier			
OBR-29.1.1	Entity Identifier	S-EX-A	ORD723222-4	
OBR-29.1.2	Namespace ID	S-EX-A	NIST EHR	
OBR-29.1.3	Universal ID	S-EX-A		
OBR-29.1.4	Universal ID Type	S-EX-A		
OBR-29.2	Filler Assigned Identifier			
OBR-29.2.1	Entity Identifier	S-EX-A	R-783274-4	
OBR-29.2.2	Namespace ID	S-EX-A	NIST Lab Filler	
OBR-29.2.3	Universal ID	S-EX-A		
OBR-29.2.4	Universal ID Type	S-EX-A		
Note 1 -Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - The HIT Module must display the relationship to the parent, but is not required to store the actual received data when the association to a specific result is achieved, otherwise use S-EX to save the information.				

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Result Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
OBX-3	Observation Identifier (Note 1)			
OBX-3.1	Identifier	S-TR-R	28-1	
OBX-3.2	Text	S-EX-A	Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)	
OBX-3.3	Name of the Coding System	S-RC	LN	
OBX-3.4	Alternate Identifier	S-TR-R		
OBX-3.5	Alternate Text	S-EX-A		
OBX-3.6	Name of Alternate Coding System	S-RC		
OBX-3.9	Original Text	S-EX		
OBX-5	Observation Value			
OBX-5.1	Comparator	S-EX	<	
OBX-5.2	Num1	S-EQ	16	
OBX-5.3	Separator/Suffix	S-EX		
OBX-5.4	Num2	S-EQ		
OBX-6	Units (Note 2)			
OBX-6.1	Identifier	S-TR-R	ug/mL	
OBX-6.2	Text	S-TR-R		
OBX-6.3	Name of the Coding System	S-RC	UCUM	
OBX-6.4	Alternate Identifier	S-TR-R		
OBX-6.5	Alternate Text	S-TR-R		
OBX-6.6	Name of Alternate Coding System	S-RC		
OBX-6.9	Original Text	S-EX		
OBX-7	Reference Range	S-EX		
OBX-8	Abnormal Flags	S-TR-R	I	
OBX-11	Observation Result Status	S-TR-R	F	
OBX-14	Date/Time of the Observation			
OBX-14.1	Time	S-EQ	09/23/2015 14:00:	
OBX-19	Date/Time of the Analysis			
OBX-19.1	Time	S-EQ	09/26/2015 11:00:	
Note 1 - Store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				
Note 2 - If both UOM triplets are populated, receiver may choose to store the data received in either triplet; translations must result in equivalent UOM that do not require a change in the numeric result.				

Specimen Information - Incorporate Verification				
Location	Data Element Name	Store Requirement	Data	Tester Comment
SPM-4	Specimen Type (Note 1)			
SPM-4.1	Identifier	S-TR-R	I19339001	
SPM-4.2	Text	S-EX-A	Stool specimen	
SPM-4.3	Name of the Coding System	S-RC	SCT	
SPM-4.4	Alternate Identifier	S-TR-R		
SPM-4.5	Alternate Text	S-EX-A		
SPM-4.6	Name of Alternate Coding System	S-RC		
SPM-4.9	Original Text	S-EX	Stool	
Note 1 - The HIT must store the <u>Identifier</u> and the <u>Text</u> for each populated triplet using the S-EX-A, S-TR-R, or S-EX store requirement as indicated. If <u>Original Text</u> field is populated, MUST store the exact data received.				

Instructions to Testers for Verification of Store Requirements

Note: The HIT Module being tested is always allowed to incorporate/store the exact data received in the LRI message even if a given Store Requirement does not explicitly state that the HIT Module is permitted to do so.

Store Requirement	Definition	Instructions for Verification of Requirement During Conformance Testing
S-EX	Store Exact	<p>The HIT Module being tested must be designed to incorporate/store only the exact data received in the LRI message.</p> <ul style="list-style-type: none"> Tester must verify that the HIT Module being tested incorporates/stores in the patient's laboratory result record only the exact data received in the LRI message, and that the HIT Module does not just store an equivalent of that exact data or just a pointer to the exact data.
S-EX-A	Store exact by association	<p>The HIT Module being tested must be designed (1) to incorporate/store the exact data received in the LRI message OR (2) to use a pointer to a location (e.g., file/table in or accessible to the HIT Module) where the exact data can be obtained.</p> <ul style="list-style-type: none"> Tester must verify that the HIT Module being tested incorporates/stores in the patient's laboratory result record the exact data received in the LRI message OR that the HIT Module incorporates/stores in the patient's laboratory result record a pointer to the exact data received in the LRI message. <p>Example: Placer Number; the HIT-originated Placer Number received in the LRI message may be incorporated/stored using a pointer rather than being stored redundantly in the patient's lab result record.</p>
S-EQ	Store equivalent	<p>The HIT Module being tested must be designed to transform the exact data received in the LRI message to an equivalent format and then incorporate/store the equivalent format.</p> <ul style="list-style-type: none"> Tester must verify that the HIT Module being tested transforms the exact data received in the LRI message to an equivalent format and incorporates/stores the equivalent format in the patient's laboratory result record.
S-TR-R	Translate and store translation (exact value can be re-created from translation any time)	<p>The HIT Module being tested must be designed to transform the exact data received in the LRI message to an equivalent value and then incorporate/store the equivalent value.</p> <ul style="list-style-type: none"> Tester must verify that the HIT Module being tested incorporates/stores in the patient's laboratory result record the equivalent value. Tester must also verify that the HIT Module is able to re-create from this equivalent value the exact data received in the LRI message.
S-RC	Process and re-create	<p>The HIT Module being tested must be designed to process and incorporate/store in an "abstract-able manner" (e.g., using the HIT Module's data model) the exact data received in the LRI message and to re-create the exact data (e.g., from the HIT Module's data model).</p> <ul style="list-style-type: none"> Tester must verify that the HIT Module being tested processes and abstractly incorporates/stores in the patient's laboratory result record the exact data received in the LRI message. Tester also must verify that the HIT Module is able to re-create the exact data received in the LRI message by abstracting the data (e.g., from the HIT Module's data model). <p>Example: Identifier Type Code; the HIT Module uses a separate file/table to store Social Security Numbers versus internal Medical Record Numbers, and does not need to retain the Identifier Type Code</p>

MSH|^~&|NIST Test Lab APP|NIST Lab Facility|NIST EHR Facility|20150926140551||ORU^R01^ORU_R01|LRI_4.1_4.1-NG_FRU|D|2.5.1|||AL|AL|||LRI_Common_Component^^2.16.840.1.113883.9.16^ISO~LRI_NG_Component^^2.16.840.1.113883.9.13^ISO~LRI_FRU_Component^^2.16.840.1.113883.9.83^ISO

PID|1||PATID1234^^^NIST MPI^MR||Jones^William^A^^^^L||19610627|M||2106-3^White^HL70005|||||PATID1234^^^NIST MPI^AN

ORC|RE|ORD723222-4^NIST EHR|R-783274-4^NIST Lab Filler|GORD874211^NIST EHR|||||5742200012^Radon^Nicholas^^^^^^NPI^L^^NPI
^^NPI

OBR|1|ORD723222-4^NIST EHR|R-783274-4^NIST Lab Filler|625-4^Bacteria identified in Stool by Culture^LN^3456543^CULTURE STOOL^99USL^2.52^^Stool Culture||201509231400|||||5742200012^Radon^Nicholas^^^^^^NPI^L^^NPI|||||20150926140551||F|||10092000194^Hamlin^Pafford^^^^^^NPI^L^^NPI|||||MIC^Observation of type microbiology^HL70411^^^2.5.1|CC^Copies Requested^HL70507

OBX|1|CWE|625-4^Bacteria identified in Stool by Culture^LN^^^^2.52^^Stool Culture|^1^1^IsIt-1|103429008^Enterohemorrhagic Escherichia coli, serotype O157:H7^SCT^^^^201509USED^^Shiga toxin producing E. coli O157:H7 isolated||A||F||201509231400|||||201509251930|||||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsalot^Phil^J.^^^^NPI^L^^NPI||||RSLT

NTE|1||Susceptibility testing for E.coli is not performed, because antibiotics should not be used to treat this infection. There is no evidence that treatment with antibiotics is helpful, and taking antibiotics may increase the risk of hemolytic-uremic syndrome (HUS). Antidiarrheal agents like Imodium may also increase that risk. Non-specific supportive therapy, including hydration, is important.

OBX|2|CWE|625-4^Bacteria identified in Stool by Culture^LN^^^^2.52^^Stool Culture|^2^1^IsIt-2|398567006^Salmonella I, group O:4^SCT^^^^201509USED^^Salmonella I, group O:4 isolated||A||F||201509231400|||||201509251930|||||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsalot^Phil^J.^^^^NPI^L^^NPI||||RSLT

NTE|1||Salmonella gastrointestinal infections usually resolve in 5-7 days and most do not require treatment other than oral fluids. Persons with severe diarrhea may require rehydration with intravenous fluids. Antibiotic therapy can prolong the duration of excretion of non-typhoidal Salmonella and is recommended only for patients with severe illness (e.g., those with severe diarrhea, high fever, bloodstream infection, or who need hospitalization) or those at risk of severe disease or complications, including young infants, older adults (over 65 years old) and immunocompromised persons. Antibiotic resistance is increasing among some Salmonella bacteria; therefore, susceptibility testing can help guide appropriate therapy. Choices for antibiotic therapy for severe infections include fluoroquinolones, third-generation cephalosporins, and ampicillin (for susceptible infections).

OBX|3|CWE|625-4^Bacteria identified in Stool by Culture^LN^^^^2.52^^Stool Culture|^3^1^IsIt-3|85729005^Shigella flexneri^SCT^^^^201509USED^^Shigella flexneri isolated||A||F||201509231400|||||201509251930|||||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsalot^Phil^J.^^^^NPI^L^^NPI||||RSLT

NTE|1||Antibiotic treatment is recommended for patients with severe disease, bloody diarrhea, or compromised immune systems. Resistance to traditional first-line drugs like ampicillin and trimethoprim-sulfamethoxazole is common, and resistance to some other antibiotics is increasing. With this in mind, antibiotic susceptibility testing can help guide appropriate therapy. When an ampicillin- or trimethoprim-sulfamethoxazole-resistant strain is isolated, choices for therapy include fluoroquinolones, ceftriaxone, and azithromycin.

SPM|1|S-2015-66&GoodHealthC_EHR^S-9911-33&NIST Lab Filler|119339001^Stool specimen^SCT^^^^201509USED^^Stool|||||201509231400

ORC|RE||R-783274-6^NIST Lab Filler|GORD874211^NIST EHR|||||5742200012^Radon^Nicholas^^^^^^NPI^L^^NPI

OBR|2||R-783274-6^NIST Lab Filler|50545-3^Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)^LN^^^^2.52^^Bacteria susceptibility||201509231400|||||G||||5742200012^Radon^Nicholas^^^^^^NPI^L^^NPI|||||20150927112054||F|625-4^Bacteria identified in Stool by Culture&LN&&&&2.52&&Stool Culture^&2&1^IsIt-2||10092000194^Hamlin^Pafford^^^^^^NPI^L^^NPI|ORD723222-4&NIST EHR^R-783274-4&NIST Lab Filler|||||MIC^Observation of type microbiology^HL70411^^^2.5.1|CC^Copies Requested^HL70507

OBX|1|SN|28-1^Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1^IsIt-2|^<0.06|ug/mL^^UCUM^^^^1.9||S||F||201509231400|||||201509261100|||||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsalot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

OBX|2|SN|267-5^Gentamicin [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1^IsIt-2|^0.05|ug/mL^^UCUM^^^^1.9||S||F||201509231400|||||201509261100|||||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsalot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

OBX|3|SN|185-9^Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1^IsIt-2|^0.05|ug

/mL^^UCUM^^^^1.9||S||F|||201509231400||||201509261100|||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsallot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

ORC|RE|R-783274-7^NIST Lab Filler|GORD874211^NIST EHR|||||5742200012^Radon^Nicholas^^^^NPI^L^^NPI

OBR|3|R-783274-7^NIST Lab Filler|50545-3^Bacterial susceptibility panel in Isolate by Minimum inhibitory concentration (MIC)^LN^^^^2.52^^Bacteria susceptibility||201509231400|||G||||5742200012^Radon^Nicholas^^^^NPI^L^^NPI||||20150927164251|||C|625-4&Bacteria identified in Stool by Culture&LN&&&&2.52&&Stool Culture^&3&1&IsIt-3||10092000194^Hamlin^Pa fford^^^^NPI^L^^NPI|ORD723222-4&NIST EHR^R-783274-4&NIST Lab Filler|||||||||MIC^Observation of type microbio logy^HL70411^^^^2.5.1||CC^Copies Requested^HL70507

OBR|1|SN|28-1^Ampicillin [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1^IsIt-3|<^16|ug/mL^^ UCUM^^^^1.9||I||F|||201509231400||||201509261100|||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Ange les^CA^90067^^B|5432178916^Knowsallot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

OBR|2|SN|516-5^Trimethoprim+Sulfamethoxazole [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1 ^IsIt-3|^2^/^38|ug/mL^^UCUM^^^^1.9||S||B||201509231400||||201509271120|||Century Hospital^^^^CLIA^XX^^24D9871327|2 070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsallot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

NTE|1||Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previouis report.

OBR|3|SN|185-9^Ciprofloxacin [Susceptibility] by Minimum inhibitory concentration (MIC)^LN^^^^2.52|^1^1^IsIt-3|^0.05|ug /mL^^UCUM^^^^1.9||S||B||201509231400||||201509271120|||Century Hospital^^^^CLIA^XX^^24D9871327|2070 Test Park^^Los Angeles^CA^90067^^B|5432178916^Knowsallot^Phil^J.^^^^NPI^L^^NPI||||RSLT|SUR

NTE|1||Due to the indeterminate amoxicillin test result, additional antibiotics were tested and appended to the previouis report.