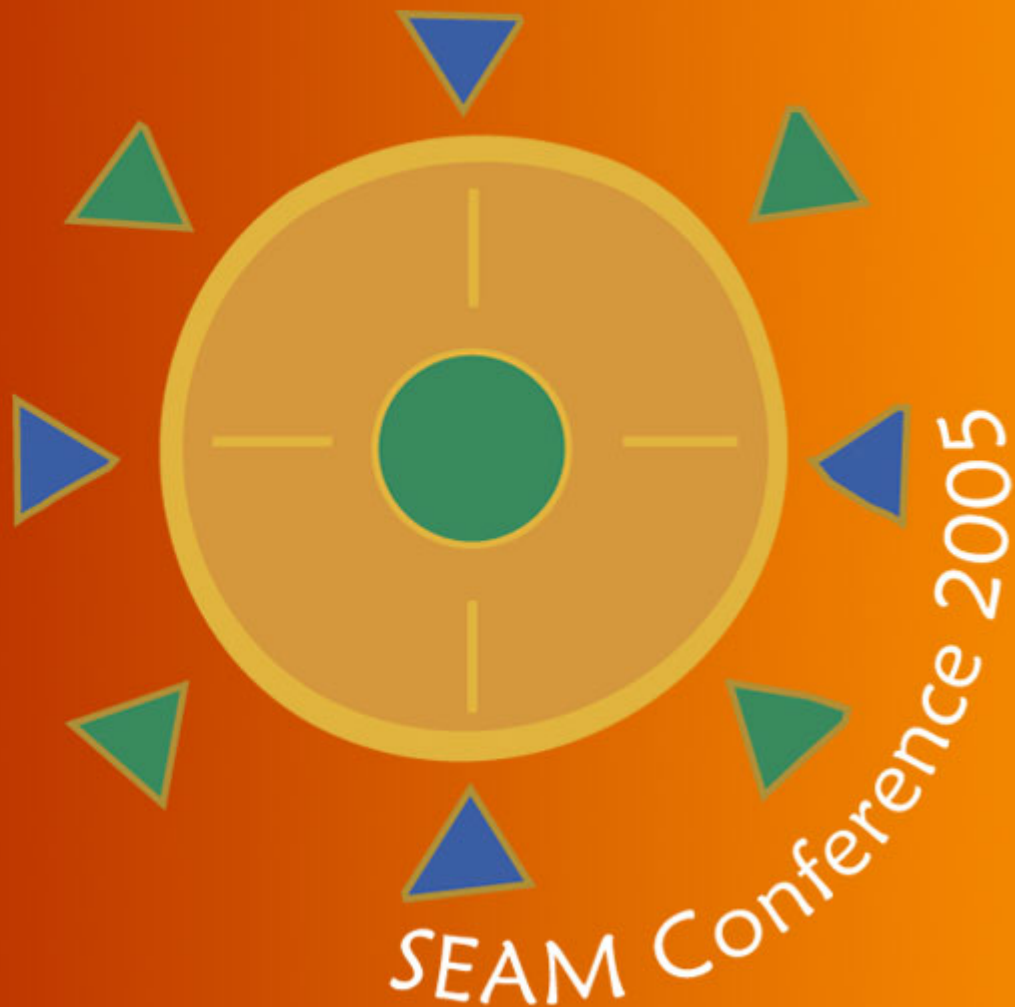




Accra, Ghana • June 20–22

Targeting Improved Access

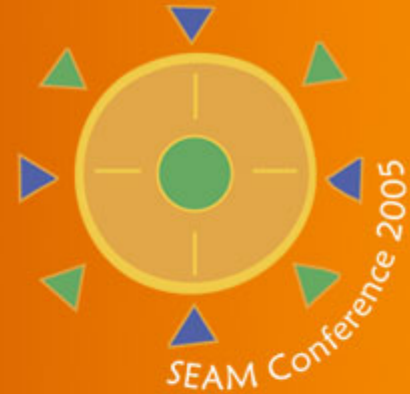


MANAGEMENT SCIENCES *for* **HEALTH**

SEAM | Strategies for Enhancing Access to Medicines

Funding for the SEAM Program is provided by the Bill & Melinda Gates Foundation.

Targeting
Improved
Access



Accra, Ghana • June 20–22

Facilitating Pooled Procurement and Inventory Management through Use of Best Practices-Based Software: The Role of ORION@MSH

Arin Speed
Management Sciences for Health

Funding for the SEAM Program is provided by the Bill & Melinda Gates Foundation.



MANAGEMENT SCIENCES *for* HEALTH

SEAM | *Strategies for Enhancing Access to Medicines*

Why? - The Need

- ❖ 1998 WHO commission on drug management software
 - ❖ Questionnaire distributed to 42 companies
 - ❖ Eight suitable packages (INVEC-2)
- ❖ INVEC-2
 - ❖ Limited: DOS-based; weak data analysis
 - ❖ Changing policy at MSH

How? - The Way Forward

- ❖ MSH awarded funding for SEAM Program in 2000

- ❖ Options available:
 1. Develop the software in-house
 2. Outsource the software development
 3. Customize an existing commercial package

- ❖ Option #3 was agreed upon



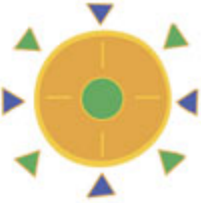
How? - The Decision Process

- ❖ Contracted with Mitretek Systems (a non-profit technology consulting company) to help manage the process
- ❖ List of 253 requirements compiled that were drawn from:
 - ❖ Existing functionality present in MSH software
 - ❖ User needs analysis and surveys
- ❖ Identified 125 potential companies – Top 4 vendors were selected to give on-site demonstrations to MSH personnel
- ❖ Solicited request for proposal (RFP) and best and final offer (BAFO) files from two finalists, Columbus IT (Axapta) and 3i-Infotech (ORION)
- ❖ Selected 3i-Infotech's ORION product in October 2002



When? – Development Timeline

- ❖ November 2002 – February 2003:
 - ❖ Functionality definition and refinement
- ❖ October 2003 – April 2004:
 - ❖ Acceptance testing with MSH staff
- ❖ May 2004 – June 2004:
 - ❖ Pilot phase – PPS & St. Lucia CMS
- ❖ July 2004 - Present:
 - ❖ Installations



Where? - ORION@MSH Installs

❖ Caribbean

- ❖ Pooled Procurement Service (PPS)
- ❖ Dominica CMS
- ❖ Grenada CMS
- ❖ St. Kitts and Nevis CMS
- ❖ St. Lucia CMS
- ❖ St. Vincent and the Grenadines CMS

❖ Africa

- ❖ Mission for Essential Medical Supplies, Tanzania
- ❖ GSMF International, Ghana
- ❖ GSMF Enterprises Limited, Ghana
- ❖ National Catholic Secretariat, Ghana
 - ❖ Catholic Pharmaceutical Service
 - ❖ Accra Catholic Drug Centre
 - ❖ Sunyani Diocesan Hospital Pharmacy



What? - ORION@MSH

- ❖ Enterprise-wide software package
- ❖ Supports medical stores supply management
- ❖ Modules:
 - ❖ Supply Chain & Distribution Management
 - ❖ Tender & Procurement
 - ❖ Inventory
 - ❖ Warehouse
 - ❖ Sales
 - ❖ Vehicle & Equipment Management
 - ❖ Financial Management
 - ❖ General Ledger, Accounts Receivable & Accounts Payable



What? - ORION@MSH Features

- ❖ Designed with best practices found in pharmaceutical supply management.
- ❖ Modular design allows the use of some or all portions of program.
- ❖ Incorporates the functionality of existing MSH pharmaceutical management software (e.g., INVEC-2, ECPRO & CLM).
- ❖ Various levels of security to protect data.
- ❖ Multi-currency to facilitate international buying and selling.
- ❖ Client version runs on Windows NT/2000/XP; server version runs on Windows NT/2000/XP, Linux, or various versions of Unix.



What? - Tender & Procurement Processes

❖ Tender Procurement

For all types of catalogue items that are procured through tender for stocking and distribution.

❖ Non-Tender Procurement

For all types of catalogue items that are procured for stocking and distribution.

❖ Non-Stock Procurement

For things that are purchased, but not stocked in inventory, e.g., plane tickets, etc.

❖ Special Orders

For non-catalogue items that are procured based on special requests from customers.

What? - Tender & Procurement Processes (cont.)

❖ Donor Stock Procurement – Tender/Non-Tender

For items that are procured for vertical programs or donors.

❖ Consumables Procurement

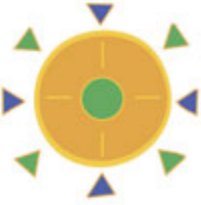
For consumables such as gas, tyres, packaging, pallets, marketing material, etc.

❖ Fixed Asset Procurement

For fixed asset procurements for the organization.

❖ Pooled Procurement

Centralized procurement; Central Procurement Group procures goods and Participating Groups give their requirements for purchasing.



What? - Tender & Procurement Key Features

Tendering

- ❖ **System-suggested quantity requirement.**
- ❖ **Supports electronic bidding.**
- ❖ **Facility to provide price benefit to local manufacturer while evaluating bids.**
- ❖ **Supports tender evaluation based on World Bank guidelines.**
- ❖ **Auto generation of contract based on bid awarding.**
- ❖ **Maintains contract price amendment history.**

Procurement

- ❖ **Facilitates order scheduling (when, what, how much, from whom).**
- ❖ **Enables tracking of orders and shipments.**
- ❖ **Consolidates requisitions.**
- ❖ **Facilitates comparison of supplier quotations.**
- ❖ **Built-in supplier performance monitoring.**

What? - Tender & Procurement Key Features (cont.)

Pooled Procurement

- ❖ **Electronically consolidates forecasts.**
- ❖ **Maintains outstanding payments to suppliers by participating organizations.**
- ❖ **Electronic distribution of contract details to participating organizations.**
- ❖ **Tracks orders till payment.**
- ❖ **Statement of accounts payable and aging.**



Window



Demo Inc



Menu Manager

Find

- Procurement**
- Inventory**
- Sales**
- Vehicle & Equipment**
- General Ledger**

- **Tender Procurement**
 - o Suggest Order Quantity
 - o Review Suggested Order Quantity
 - o Define Tender
 - o Define Tender Exchange Rates
 - o Enter & Review Bids
 - o Import Excel Bids
 - o Award Contracts
 - o Import Excel Contract
 - o Edit Contracts
 - o Create Purchase Orders
 - o Enter Shipment Advice
- + Non Tender Procurement
- + Non Stock Procurement
- + Special Orders
- + Donor Stock Procurement - Tender
- + Donor Stock Procurement - Non Tender
- + Consumables Procurement
- + Fixed Asset Procurement
- + Pooled Procurement - Tender



Tender Procurement



Demo Inc



Define Tender

ORION 02/04/2004 Approved Submitted ?

Tender Date: 02/04/2004 Location Code: W1 Central Warehouse Doc.No.: TNT 11 / 2

Tender From: PPL Purchase Proposal Ref Doc: PPT 27

Tender No.: CMS/893247/R-343 Board Review No.: 1

Tender Start Date: 02/04/2004 Tender Closing Date: 02/06/2004

Bid Opening Date: 03/06/2004 Tender Type: OPEN Open Tender

Evaluation Currency: USD US Dollars Tender Value in ECD: 1,500,000.00

Bond Percentage: 2 Bond Value in ECD: 30,000.00

EMD Amount in ECD: 45,000.00 Tender Sealed?

Annotation: For August-04 Total No. of Items: 44

Amendment Details: No 2 Date: Reason:

Flex	Reference	Items	Suppliers	Tentative Delivery	Preference	Doc Detail
------	-----------	-------	-----------	--------------------	------------	------------

Item Code	Stk?	Grade Code 1	UOM Code	Quantity	Min Shelf Life	Adjustment Expiry	Type	Pack Code	Quantity	Delete ?
08013	<input checked="" type="checkbox"/>	A	BOTT	12300	000		DECR	BOTT	12300	<input type="checkbox"/>
30002	<input checked="" type="checkbox"/>	A	STRIPS	5345	000		DECR	STRIPS	5345	<input type="checkbox"/>
41022	<input checked="" type="checkbox"/>	A	NEED	24334	000		DECR	NEED	24334	<input type="checkbox"/>
07010	<input checked="" type="checkbox"/>	A	PENCI	32432	000		DECR	PENCI	32432	<input type="checkbox"/>
40005	<input checked="" type="checkbox"/>	A	EACH	23233	000		DECR	EACH	23233	<input type="checkbox"/>

Item Name: Framycetin Sulphate Adjustment Type Name: Decrease Local Supplier Price

Grade Code 1: GRADE A Grade Code 2: G2



Central Medical Stores - St. Lucia



Item Master

Item Code: 01003
 Generic Name: A0001 Acetylsalicylic Acid
 Strength / Size: 600mg 600mg
 Dosage Form: TAB TAB
 Route of Administration: PO ORAL
 Base UOM: TAB TAB

Stock Item ?

Bilingual
 Freeze
 Generate

Item Description: Acetylsalicylic Acid 600mg TAB ORAL TAB
 Short Description: Acetylsalicylic Acid 600r
 Supplementary Name: aspirin
 Tender Specification:

VEN Class

V
 E
 N

Pooled Procurement Item Code: ASA600T

Item URL

Parameters

Analysis

Batch/Serial No

Flex

Item Class

A
 B
 C

Warehouse

Storage Temperature: 20 Forced Putaway ?
 Temperature Tolerance: 5 Multibatch Pallet ?

Dimension Lead Time Days: 90
 Batch Item? Batch Costing? Safety Stock Factor: 1.00
 Superseded
 Serial No SrNo Costing ?



Demo Inc



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Item Name: Framycetin Sulphate Adjustment Type Name: Decrease Local Supplier Price

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What? - ORION@MSH Survey

- ❖ Created surveys for managers/users
- ❖ Distributed to Eastern Caribbean sites
- ❖ Mix of open-ended and close-ended questions
- ❖ Overall positive reaction



What? - ORION@MSH Survey (cont.)

❖ Strengths

- ❖ Aids in monitoring issue by expiry date
- ❖ Ability to easily analyze collected data in Excel or Word
- ❖ Can be tailored for individual customers

❖ Areas to Address

- ❖ Reporting
- ❖ User interface

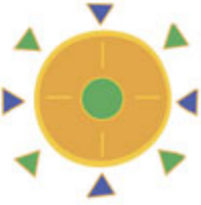
Who? - “Special Pricing” for ORION@MSH

- ❖ MSH - 3i Infotech agreement
 - ❖ Allows for purchase of ORION@MSH – at “special pricing”
 - ❖ Recipient contacts MSH to receive rates

- ❖ Recipient must be either:
 - ❖ A governmental unit located in a developing country
 - ❖ An entity or governmental unit that acts as or on behalf of a public health system in such developing countries
 - ❖ An entity or governmental unit that will be using the software to service underserved populations

Who? - “Special Pricing” for ORION@MSH (cont.)

- ❖ "Developing countries" are defined as those countries with a per capita gross national income for 2001 of \$2,975 or less as identified by the World Bank, and such additional countries as may meet this criterion based on the per capita gross national income for 2002.
- ❖ “Underserved populations” are defined as populations in which 50% or more of the people served live below the amount equal to double the poverty line for the region in question.



What Next?

- ❖ Web-based functionality
- ❖ Interface with other software
 - ❖ Quantimed
 - ❖ SIAMED
 - ❖ Barcoding
- ❖ PDAs?

THANK YOU!

THANK YOU!

THANK YOU!

