



SoonerCare Health Management Program

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Agenda

Background

SoonerCare Health Management Program

Predictive Modeling Overview

Behavioral Health Grant



Background

- Oklahoma Medicaid Reform Act of 2006
 - Mandated a Disease Management Pilot
 - Decrease cost for chronic conditions
 - Increase quality of care



SoonerCare Background

- Oklahoma Health Care Authority (OHCA)
 - Oklahoma's Medicaid Agency
- SoonerCare
 - Oklahoma's Medicaid Coverage Product
 - ≈600,000 covered lives per month



Member Statistics

- Oklahoma Ranks:
 - **50th** in deaths due to heart disease
 - **46th** in deaths due to stroke
 - **46th** in deaths due to diabetes

Source: United States Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Health Statistics, Compressed Mortality File compiled from 1999-2004, Series 20 No. 2J, Accessed 7/23/2007 via the CDC Wonder On-line Database.



Member Statistics

- 80% of expenditures are for chronic disease
- 40% of members have a chronic disease
- 10% of members account for 70% of cost
- 5% of members account for 50% of the cost



Top Chronic Condition Diagnosis By Cost

1	HTN	6	CKD
2	COPD	7	Asthma
3	CHF	8	HIV
4	DM	9	Hepatitis
5	CAD	10	Hyperlipidemia

*excludes members in institutional settings and pregnancy related diagnosis



SoonerCare Health Management Program (SoonerCare HMP)

- Unique and progressive program
- Dual Focus
 - Patient
 - Provider
- Truly Comprehensive
- Utilizes state of the art predictive modeling
- Holistic



Truly Comprehensive

- Members are selected by risk, not disease
 - *Treat the person not the condition*
- Active Behavioral Health Component
- Active community resource support component
- Aggressive case management
- Aggressive provider education and practice re-design



Member Intervention Nurse Case Management

- Health risk assessment
- Health literacy assessment
- Behavioral health screening
- Medication list
- Aggressive education and self-management training



Member Intervention

- Behavioral health referral
 - Full time FTE (OHCA) dedicated to receiving calls from NCMs
- Community resource referral
 - Full time FTE (HMP Vendor) dedicated to receiving referrals
- HMP interfaces with OHCA care management unit



Member Selection and Stratification

- Tier 1 – Face to Face Intervention
 - Top 1,000 at **very high** risk
- Tier 2 – Telephonic Intervention
 - Top 4,000 at **high** risk



Member Selection & Stratification

- Predictive Modeling

- Based upon risk score, not disease
- Focus on those with the greatest opportunity to impact



Why Predictive Modeling?

Oklahomans rely on predictions every day.

Vendor of Choice: MEDai, Inc.

Some using models



Some not!

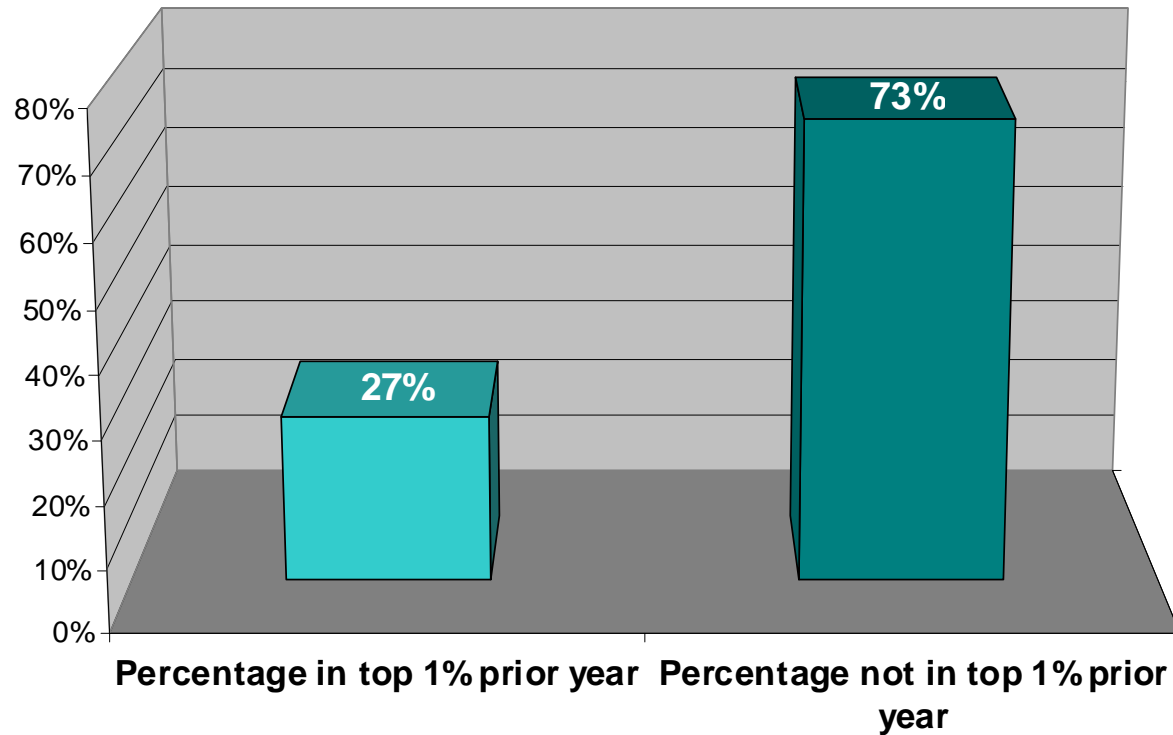
Big 12 South – Oklahoma

Consensus prediction: 1st place in the Big 12 South (only *College Football News* failed to pick the Sooners 1st, predicting Oklahoma to finish 2nd)



Prior Cost Identification Results

**Members in Top 1%
Current Year**





So...What Do We Need?

Provide Care Managers with Appropriate Information to Identify the Right Member at the Right Time

- **Identify appropriate members for interventions**
 - Prioritize members for intervention
 - Identify High Cost members and “Movers”
 - Evaluate “Impact Index” – Members with most impactable gaps in guidelines or forecasted acute care and assessment of cost impact
 - Risk stratification (1-5) assists in development of appropriate interventions

- **Access member-specific actionable information**
 - Member Clinical History
 - Member Risk Profile
 - Member Specific Guideline Gap report

- **Conduct summary and detailed reporting**
 - Provider Profiling
 - Employer Reporting
 - Disease Profiling



The Solution Should...

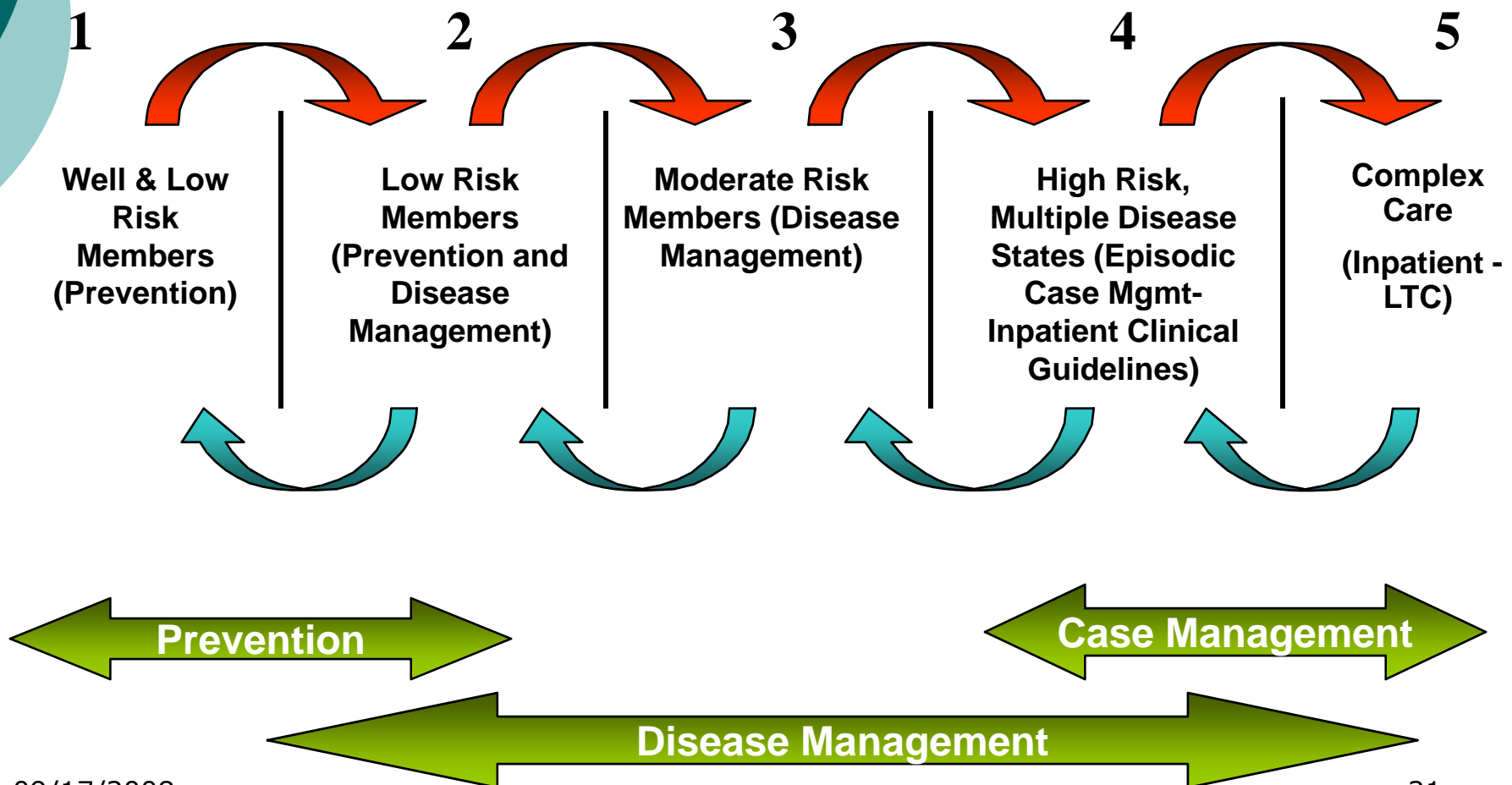
- **Provide High-Risk Identification**
 - Only Step 1
 - Catastrophic members often not high impact
- **Identify Movers**
 - Helps with “regression to the mean” issues
- **Forecast Inpatient Days, ER Visits and Rx\$**
 - Individualized action plans per member
- **Forecast High Chronic Impact Members**
 - Best opportunity for chronic care savings
 - Best opportunity to impact cost by intervening with evidence based guidelines
- **Implement Forecast via Impact Index**
 - Acute & Chronic Impact Index
 - Easily ranks members
- **Allow for Workflow Integration**
 - Detailed member profiles



Insights are Leveraged in Multiple Functional Areas

- **Care Management** – Identify and stratify patients for focused interventions
- **Physician Integration** – Engage physicians with support for disease management and guideline compliance
- **Actuarial and Underwriting** – Enhance rate setting capabilities and support actuarial processes

Care Management Insights are Generated Around the Population and Members are Stratified Accordingly





ROI: Acute and Chronic Impact Indices

Disease Focus: Diabetes

Total Population: 925,407 members
Diabetic Population: 50,847 members
Savings Potential: \$62,643,504

High-Risk Population Risk Levels 4 & 5

14,250 Members
Forecasted Cost: \$14,634
Prior Year Cost: \$14,527

Savings Potential:
\$1,524,750

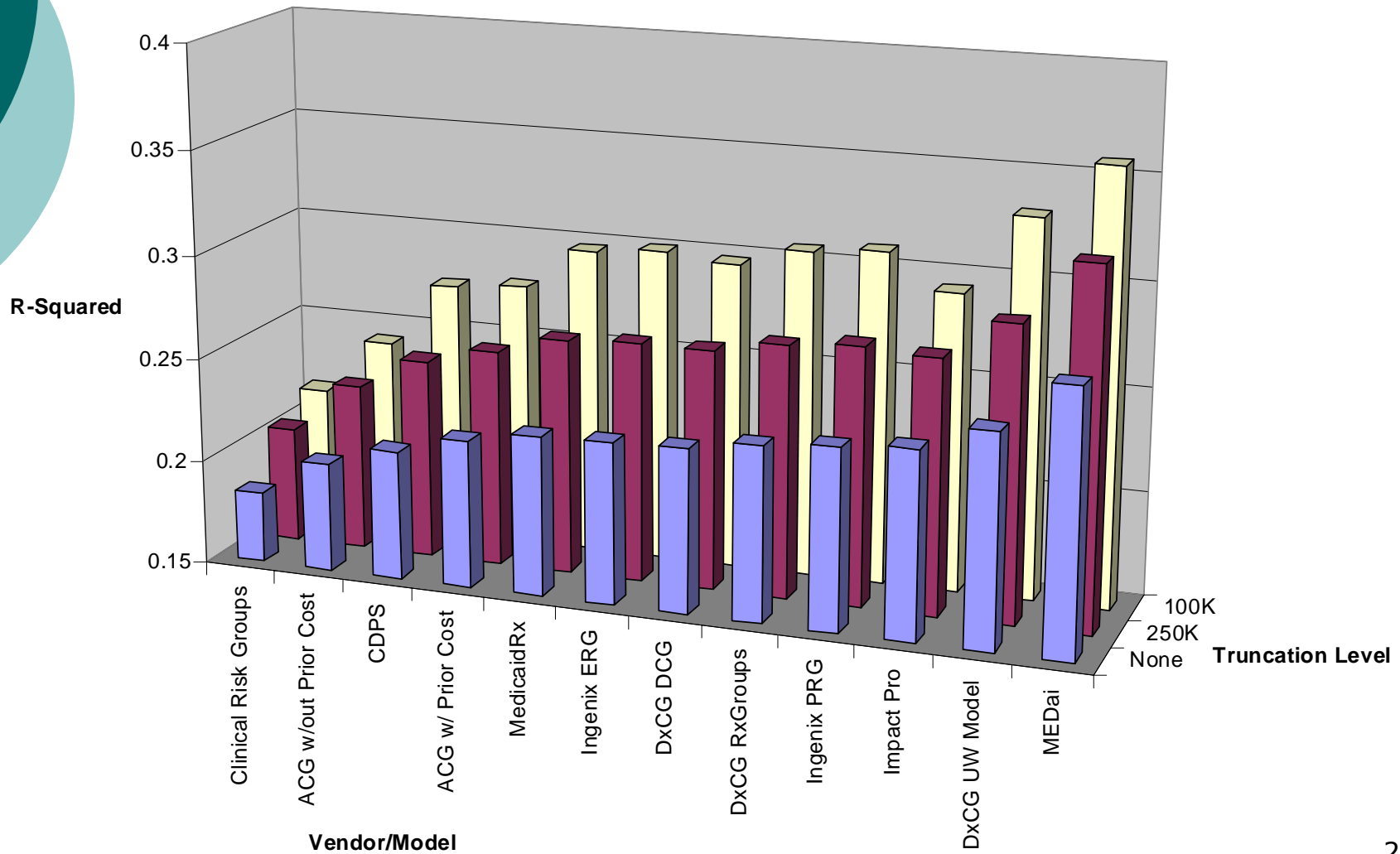
High Acute & Chronic Impact Population

13,872 Members
Forecasted Cost: \$8,698
Prior Year Cost: \$5,089

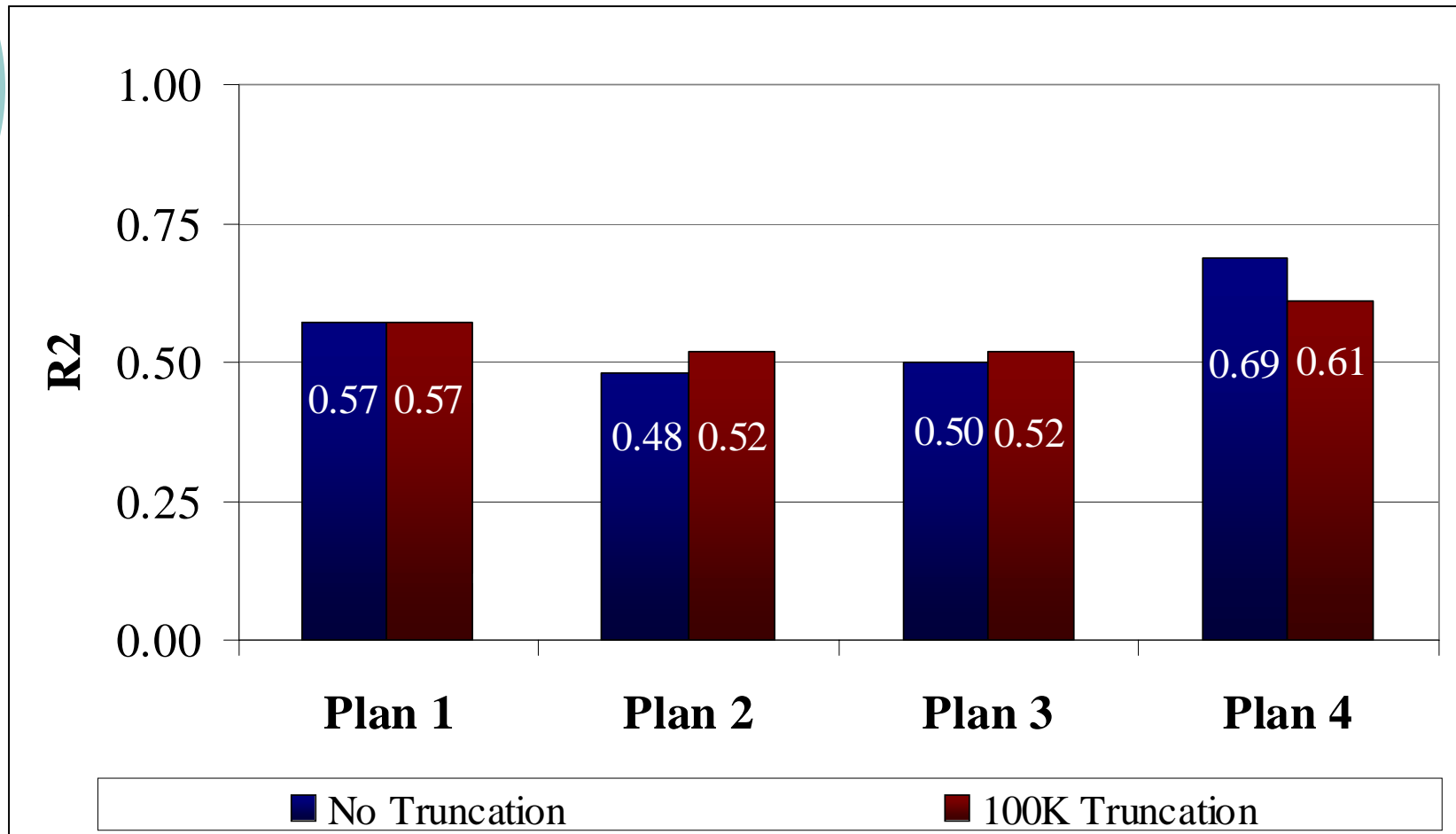
Savings Potential:
\$50,064,048

Accuracy is Important!

2007 SOA Results



Medicaid Modeling Results





Why Predictive Modeling?

- The goal of the SoonerCare HMP is to help people
 - The whole person, not the disease
- Predictive modeling identifies and ranks people who need that help.



Predictive Modeling

- Members selected for actionable risked based information based on their entire health profile
 - Acute Risk Score
 - Ranks individuals by opportunity to avoid high-cost acute care
 - Reflects IP and ER component of overall prediction

Deliverable Date Range : 06/01/2007 - 05/31/2008

Member Profile

Member Information			
Member ID	9999	Total Cost	\$153,117
Member Name	SoonerCare, Suzie	Forecasted Cost	\$144,000
Member SSN	9999999	Forecasted IP LOS	40.00
Group Name	SOONERCARE CHOICE ABD	Forecasted ER Visits	8.00
Age/DOB		Forecasted Rx Cost	\$1,911
Gender		Forecasted Risk Index	47.26
Months Enrolled	12	Forecasted Risk Category/Percentile Ranking	Category 5 / Rank 100
Active (Y/N)	Y	Impact Score	Acute=98.00/Chronic=98.00
Rx Benefits (Y/N)	Y	Line Of Business	Choice ABD
Rx Type	FULL	Care Mgmt Program	DM2 - CLOSED
Active PCP Name	Clinic 1	Primary Diagnosis	Infectious Disease
DEA #		Phone Number(s)	(home) 0007942584
Address			



Diagnosis Groups Summary					
Diagnosis Category	Rx	Mgmt	Facility	Ancillary	Total Diagnosis Cost
Burns, Skin Trauma	\$4	\$546	\$0	\$0	\$550
Central Nervous System	\$5	\$359	\$0	\$0	\$564
Degenerative Ortho disease	\$15	\$0	\$0	\$23	\$38
Dermatology	\$127	\$85	\$0	\$43	\$255
Diabetes	\$608	\$557	\$0	\$143	\$1,308
Hypertension	\$7	\$0	\$0	\$7	\$14
Infectious Disease	\$26	\$885	\$138,863	\$269	\$140,043
Metabolic Disorders	\$0	\$256	\$0	\$0	\$256
Miscellaneous Disorders	\$6	\$0	\$0	\$0	\$6
Orthopedics	\$22	\$0	\$0	\$0	\$22
Pneumonia	\$137	\$207	\$0	\$328	\$1,164
Psychiatric Disorders	\$119	\$315	\$0	\$381	\$815
Pulmonary Disorders	\$0	\$47	\$0	\$0	\$47
Skin inflammation	\$15	\$1,461	\$0	\$2,947	\$4,877
Trauma	\$87	\$331	\$0	\$39	\$657



Therapeutic Class	Last Fill Date	Count	Total Cost
ANTI-ULCER PREPS/GASTROINTESTINAL PREPS	03/26/08	1	\$15
ANTIARTHRITICS	11/20/07	2	\$17
ANTINAUSEANTS	10/13/07	1	\$5
ATARACTICS-TRANQUILIZERS	03/09/08	2	\$10
CEPHALOSPORINS	07/09/08	1	\$4
DIABETIC THERAPY	05/109/08	6	\$586
LIPOTROPICS	02/26/08	2	\$19
MUSCLE RELAXANTS	05/07/08	8	\$88
NARCOTIC ANALGESICS	02/01/08	6	\$28
OTHER ANTIBIOTICS	05/0/08	2	\$124
OTHER HYPOTENSIVES	03/26/08	1	\$7
PSYCHOSTIMULANTS-ANTIDEPRESSANTS	05/09/08	8	\$108
SEDATIVE NON-BARBITURATE	01/07/08	1	\$6
SULFONAMIDES	06/09/08	4	\$42
URINARY ANTIBACTERIALS	02/15/08	1	\$120

Provider Information - Professional Summary				
	Physician Name	Specialty	Total Cost	# Services
	Doc 1	FAMILY PRACTICE	\$250	2
	Doc 2	INTERNAL MEDICINE	\$132	2
	Doc 3	FAMILY PRACTICE	\$112	2
	Doc 3	FAMILY PRACTICE	\$34	1
	Doc 5	INTERNAL MEDICINE	\$557	8
	Doc 6	CARDIOLOGY	\$63	3
	Doc 7	DIAGNOSTIC RADIOLOGY	\$105	3
	Doc 8	INTERNAL MEDICINE	\$170	2
	Doc 9	DIAGNOSTIC RADIOLOGY	\$61	2
	Doc 10	GENERAL SURGERY	\$1,049	4
	Doc 11	DIAGNOSTIC RADIOLOGY	\$59	4
	Doc 12	DIAGNOSTIC RADIOLOGY	\$40	4
	Doc 13	DIAGNOSTIC RADIOLOGY	\$15	2
	Doc 14	DIAGNOSTIC RADIOLOGY	\$7	1
	Doc 14	DIAGNOSTIC RADIOLOGY	\$61	1
	Nurse 1	CERTIFIED REGISTERED NURSE ANESTHETIST	\$327	1
	Nurse 1	CERTIFIED REGISTERED NURSE ANESTHETIST	\$302	1
	DME 1	MEDICAL SUPPLY COMPANY	\$1,890	5



	AMB 1	AMBULANCE SERVICE	\$382	2
	Doc 8	INTERNAL MEDICINE	\$242	2
	Clinic 1	CLINIC	\$256	5
	Clinic 1	CLINIC	\$9	1

Provider Information - Inpatient Summary				
Provider ID	Provider Name	Specialty	LOS (days)	Total Cost
	Hosp 1	HOSPITAL	35	\$129,426

Provider Information - Outpatient Summary				
Provider ID	Provider Name	Specialty	Total Cost	# Services
	HOME HEALTH 1	HOME HEALTH AGENCY	\$939	3
	HOSP 1	HOSPITAL	\$1,745	18
	Home Health 1	HOME HEALTH AGENCY	\$1,617	42

Case Management	
Case Manager	
Initial Implementation Date	
Comments	



Today

- Giving Risk Navigator *Clinical* and provider access to contracted HMP staff
- Printing a PMPs' panel profile for practice facilitators to discuss with providers



What would we do different

- Select a larger initial group to stratify
- Categorize data by Institutional Levels of Care
- Re-consider including Medicare Members



Lessons Learned

- System of care delivery must change
 - It takes a team
- Patients have to take responsibility
 - We have to show them how
- We help people
 - The whole person, not the disease
- The Health Management Program is the right thing to do



Evaluation

- Independent (Non-biased)
- RFP Released
 - Reduce Utilization
 - Satisfaction Surveys
 - Provider
 - Member
 - Improved health status



Behavioral Health Grant

- Behavioral Health at risk for becoming inpatient
- Highest \$ diagnosis is Behavioral Health
- Predicted to have more than 4 Inpatient Days



Behavioral Health

- Specialized Case Management to align member with outpatient services
- Alignment with community partners
- Statistical analysis of outcomes
- Recent grant award from CHCS



Questions?

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