

A Community Partnership to Improve Access and Quality of Care for Medically Indigent Uninsured Patients

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ABSTRACT

Care for the uninsured is typically disjointed and inefficient with little interaction between providers within communities. The Indigent Care Collaboration (ICC) is a unique collaboration of safety net providers in Central Texas. This paper describes the structure, purpose and role of the ICC and highlights future opportunities and challenges for the organization and the community it serves. The ICC's shared data repository which contains over 2.5 million encounter records is described, providing an important picture of the changing demographic composition, disease burden and health care utilization patterns for the medically indigent population accessing care in Central Texas.

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BACKGROUND

Uninsured patients in the U.S. received an estimated \$98.9 billion in health care in 2001.¹ Increases in the number of uninsured patients, along with reductions in funding for their care are placing a considerable strain on the health care system. The term ‘safety net’ is typically used to describe a range of providers (e.g., public hospitals; charity, community, migrant and rural health clinics; and local health departments) that deliver the majority of care for the medically indigent.² Care for the uninsured is complicated by two issues. First, while the uninsured will access care where available, moving across providers as necessary, the organizations comprising the regional safety net often act independently, with little sharing of information across provider groups or clinics.³ Second, the prevailing model of care in the U.S. assumes patients are equipped with the life skills and literacy levels to act as their own advocates; in reality, the uninsured health care consumer is often poorly-prepared to negotiate a complicated health care system that places the onus on the patient to access and maintain health coverage.^{4:5} The net result is a health care service for the medically indigent that is disjointed and inefficient.^{3:6}

In this paper we will describe the rationale and structure of the Indigent Care Collaboration (ICC) - a collaboration of safety net providers in Central Texas. Compared to the U.S. average, Texas has the highest percentage of people without health insurance coverage (24.6% versus 15.9%),⁷ has the highest percentage of uninsured children (21.2% versus 11.4%),⁷ and ranks second lowest of all the states with regard to the percentage of non-elderly covered by employer-based health insurance (53.5% versus 61.5%).⁸ Per-capita Medicaid spending is below the national average (\$815 versus \$1,037 nationally),⁹ while Texas has a high percentage of people living in poverty (17.6% versus 13.3% nationally).¹⁰

Working as a group, the ICC members address multiple health care issues to improve access and quality of health care for the uninsured and under-insured in a six-county region. As a fully operational health information exchange (HIE), the ICC uses its shared data repository to improve provider access to patient information at the point-of-care. Moreover, the data supports tracking of health care utilization and the development of programs to facilitate case management, standardization of care and monitoring of patient outcomes.

MEMBERSHIP AND ORGANIZATION STRUCTURE OF THE INDIGENT CARE COLLABORATION (ICC)

Formed in 1997, the ICC is a 501(c)(3) tax-exempt, nonprofit organization comprised of 18 community partners that constitute the primary health care safety net in the region. Members include for- and non-profit hospitals, public and private clinics, faith-based, volunteer and government agencies, and local academic organizations, who deliver care from 47 different locations. (Exhibit 1) The project has a three-county service region, with many providers also accepting patients from outlying counties. These three counties have an estimated population of 1.35 million people, 13.8 percent of whom live below the federal poverty level.¹¹ The ICC is governed by a Board of Directors, composed of representatives from each of the 18 member organizations. Officers are elected by the Board to serve on an eight-member executive committee, which also includes the Executive Director of the organization and chairs of the major Board sub-committees.

Initial funding for the ICC came from the Health Resources Service Administration’s (HRSA) Community Access Program (CAP), the Robert Wood Johnson’s Communities in Charge (CIC) Program, and from Ascension Health. Currently, the ICC receives more than two-thirds of its annual \$1.6 million budget from voluntary member contributions. This will move to a three-tier membership dues model in 2007, with contributions scaled to the size and resources of member organizations.

THE ICC CENTRALIZED DATA REPOSITORY

Data from ICC members is uploaded to the ICC database by member groups in various formats on a daily to monthly basis. (Exhibit 2) Patient records are then built by the ICC in HIPAA-compliant, HL7-standard record formats, which may be subsequently accessed by authorized providers. Patients sign a consent form permitting release of records to ICC partner organizations; otherwise, the information a provider may access is restricted to that supplied by its own organization.

The ICC database contains data from all safety net providers, non-specialty hospitals and Federally Qualified Health Centers (FQHC) in the largest county (Travis). Addition of data from smaller nonprofit and community clinics is scheduled for Spring 2007. As of December 2006, the ICC database contained over 2.5 million encounter records from over 500,000 patients. While encounter data from 1999 is available, the majority of encounter records are from calendar year 2002 forward. Data include patient demographics, diagnostic and procedure codes, pharmacy data, and the time and date of the encounter. (Exhibit 3)

Population Characteristics

The ICC data repository provides a longitudinal picture of the demographic composition, disease burden and care utilization patterns for the area's un- and underinsured patients. In 2005, 594,685 encounters for 196,442 patients were captured in the ICC database. One-third (N=65,338) of the population were aged between zero and 17 years, while over 50 percent (N=100,433) were aged between 18 and 44 years. Patients aged between 45 and 64 years and those aged 65 years or older accounted for 12.8 percent and 2.8 percent of the population, respectively. (Exhibit 4) Males and females were equally represented among those less than 18 years of age, but women represented approximately two-thirds of the population aged 18 years or older. Overall, 62 percent of the population was female. Race / ethnicity was recorded for 88.1 percent of the population, with the majority of patients from minority groups (62.0%). Hispanic / Latino patients comprised the single largest ethnic / racial group (46.7%). (Exhibit 4)

Over one-fifth of encounters for children aged between zero and 17 years were for fever and acute infections (e.g., upper respiratory tract infection, acute pharyngitis and otitis media), while routine child health exams accounted for over 14 percent of all encounters in this age group. Among patients aged between 18 and 64 years, over one-fifth of encounters (20.3%) related to obstetric and gynecological issues, including contraceptive management and surveillance. The most common chronic conditions for which adults aged 18 to 64 years used safety net care were hypertension, diabetes, lumbago, and depression. The estimated prevalence of diagnosed hypertension and diabetes in this cohort were 9.6 percent and 6.4 percent, respectively. The most common indications for an encounter for patients aged 65 years or older were hypertension (21.7%), diabetes (12.0%), dyslipidemia (7.3%) and dental examination (5.4%). The pattern of these visits is consistent with national trends for ambulatory care visits.¹²

Patterns of Health Service Utilization

The ICC database represents an important source of information regarding patterns in health care utilization in this difficult-to-track population. The number of patients accessing care increased by 32.9 percent between 2003 and 2005, while the number of patient encounters increased by 23.8 percent. Patients aged between 18 and 64 years accounted for over 50 percent of the increase in the patient population and 70.0 percent of the increase in the number of encounters. The average number of encounters per patient in 2005 was 3.0. This figure is consistent with national estimates of 3.8 ambulatory care visits per person per annum reported for all patients (insured and uninsured) in 2001-02. Nationally, compared to patients with commercial insurance, uninsured patients are estimated to have lower encounter rates, while those with public insurance such as Medicaid and Medicare have higher encounter rates.¹² Consistent with national trends, encounter rates varied by age, with encounter rates for adults increasing with increasing age. (Exhibit 4) Regardless of age, female patients had more encounters than their male counterparts, with male patients aged between 18 and 44 years having the fewest

encounters (2.1) overall. The gender discrepancy persisted after correcting for encounters related to pregnancy and reproductive health. This pattern of health care is consistent with national reports of 4.4 and 3.2 ambulatory care encounters per annum for females and males, respectively.¹²

In 2005, 48.2 percent of the population (range: 15.9% to 70.3% by age and gender) received care in an emergency department (ED) on at least one occasion, with ED visits accounting for 24.9 percent of all encounters. (Exhibit 5) Patients aged less than 45 years (N=82,512) represented the majority (88%) of those attending the ED, with children aged less than 18 years and adults aged between 18 and 44 years accounting for 39 percent and 49 percent of the ED population, respectively. Of those who attended the ED in 2005, almost 60 percent (N=55,391) had no other type of service encounter during that year, accounting for 28.2 percent of the total ICC population in that year. Regardless of age, males were more likely than females to receive care in the ED, with men aged between 18 and 44 years the most likely to obtain their care solely in the ED (53.5% of all men aged 18-44 years).

The ratio of the number of ED visits to overall provider visits helps to further describe how this population accesses care. (Exhibit 6) Patients under the age of 18 received a higher percentage of their care in the ED compared to patients 18 years or older. Regardless of age, female patients received a greater proportion of their care in non-ED settings. This gender discrepancy persisted even after correcting for encounters related to pregnancy and reproductive health. The ratio of ED visits to overall visits also varied by race/ethnicity. Among patients aged less than 45 years, African Americans received the highest proportion of their care in the ED, while Caucasians were most likely to receive care in the ED among those aged 45 years or older. This pattern of care is consistent with national reports.¹²

In 2005, the ratio of inpatient admissions to ED encounters was one to eight (ranging from 1: 2.3 for those aged 65 years or older to 1: 9.0 for those aged between 18 and 64 years). Overall, the number of ED encounters captured in the database increased by 37.8 percent between 2003 and 2005, while the overall number of encounters increased by only 23.8 percent during that interval. Actual inpatient admissions declined by 3.6 percent for that period. This pattern of health care utilization appears to reflect an increasing trend towards use of the ED for non-emergency conditions.

Highlighting the need for a collaborative approach to health care for this population is the fact that patients frequently access similar services from multiple providers. Among a cohort of patients with three or more ED encounters in the 2005 calendar year (N=10,882), 28.2 percent (N=3,066) had ED encounters at two or more locations. Similarly, for patients with two or more inpatient admissions in 2005 (N=1,464), over 17% (N=254) were hospitalized at two or more different locations. Almost two-thirds of the patients in these groups (66.4% and 63.5%, respectively) had no clinic or office encounters at ICC providers during that year.

These figures highlight some of the challenges for the safety-net providers: the need to serve large numbers of patients who have no source of primary care, who obtain a high percentage of their care in the ED, and frequently switch between providers despite often having complex, chronic health conditions requiring interdisciplinary coordinated health care.

INITIATIVES TO IMPROVE ACCESS TO CARE

In an effort to reduce the number of uninsured, the ICC has implemented a number of initiatives to increase enrollment in public programs. (Exhibit 7)

Medicaider™

The ICC has worked to identify funding sources including federal, state and local programs for which uninsured patients may be eligible. Medicaider™ is an online screening tool, designed to assist caseworkers in determining the eligibility of low-income uninsured individuals for federal and state programs including Medicaid, Supplemental Security Income (SSI), and the State Child Health Insurance

Program (SCHIP). The ICC contracted the software designers to customize this tool, adding eligibility criteria for other state programs such as Title V (maternity) and Title XX (family planning) benefits, and for all available local funding programs. By screening patients for all programs simultaneously, the software enables case workers to rapidly identify funding eligibility and to direct patients to the programs for which they are eligible.

As of December 2006, almost 200,000 patients had been screened on almost 300,000 occasions, with over 100,000 applications for funding generated, of which 42,428 applications for 29,956 patients were found eligible for third party reimbursement. Almost 80 percent of the successful applications were for state and local programs highlighting the importance of the customized screening program. By matching MedicaidTM applicants with utilization data in the ICC database, the ICC can track averted costs because of improved program enrollments. Using proxy pricing, ICC providers of primary care and ancillary services were estimated to have received over \$6.0 million in reimbursements in calendar year 2005 for care delivered to 8,513 patients who were screened and found eligible for care through the MedicaidTM program.

Insure•a•kid (IAK)

To assist patients in obtaining, using and renewing their health care funding, the ICC contracts with a local nonprofit organization, insure•a•kid (IAK), to provide follow-up services for patients found eligible for programs. IAK staff conduct follow-up calls to individuals that have been screened and found eligible for programs through MedicaidTM to ensure they complete the process of applying for coverage. Using MedicaidTM, staff also help patients with the enrollment of other family members in federal, state and local programs, and once insured to use and renew their insurance.

Patient Prescription Assistance Programs (PPAP)

The pharmaceutical industry offers over 1,500 branded prescription medications free-of-charge to patients meeting certain medical and financial eligibility requirements via over 150 different patient prescription assistance programs (PPAPs). Although a valuable source of free medication, negotiating the multitude of programs and varied eligibility criteria can place a significant administrative burden on providers.^{3,13} The ICC has contracted with MedData Services to integrate their PPAP screening link into the MedicaidTM tool, to synchronize screening for PPAP medications with screening for other federal, state and local programs. Applications for eligible patients are printed, signed and processed at the time of the encounter, thereby reducing the burden on the patient to negotiate the system. These initiatives by ICC have greatly reduced the administrative burden on providers so that participation in these programs can be maximized.

Currently, ten of the 18 ICC member organizations use the MedData screening link, with a further three member organizations using in-house programs to screen for PPAP eligibility. Data elements collected through an interface with MedData are then used to populate the ICC database. Between June 2004 and December 2006, 41,872 applications were completed for 4,913 patients, resulting in the supply of almost 30,000 prescriptions to at least 3,592 patients with an estimated value of over \$9.0 million using average wholesale price (AWP).

Expanding 340B Access and the 340B Alternative Methods Program

While the PPAPs are a valuable source of free medications, these programs are not open to all patients and are limited in the range of medications covered. One initiative implemented by the ICC has been to expand access to the 340B drug-pricing program for eligible organizations, and to work with groups already enrolled to improve patient access. The 340B program is a federal program which limits the cost of covered outpatient drugs to organizations, including federally qualified health centers (FQHCs) and disproportionate share hospitals. Through 340B, medications cost an average of 49 percent of AWP. However, this program restricts the locations where a patient may obtain their medications. Working in collaboration with the Office of Pharmacy Affairs, the ICC obtained approval for a 340B

Alternative Methods Demonstration Project, a pilot project that allows existing 340B providers the option to provide discounted medications to their patients through a network of contracted pharmacies.

Group Purchasing Discount Schemes

For non-340B providers, the ICC has developed strategies to reduce patient medication costs. This has included researching group purchasing organizations that offer discounts on pharmaceuticals, medical supplies and other materials. Based on their affiliation with the ICC, several member organizations now access discounted supplies on behalf of their patients through such group purchasing organizations as AmeriNet.

Other Initiatives

The ICC is involved in advocacy work in the community. This has included a campaign culminating in the creation of the Travis County Healthcare District - a dedicated taxing structure providing a centralized fund to finance indigent care and with the responsibility of coordinating and planning indigent health care in the county. As part of the planning process, the ICC has conducted a series of studies including primary care capacity and ED utilization reports, so that region-specific strategies to improve access to care can be developed. The ICC members have also worked in collaboration with other organizations in the community to increase access to care. These initiatives have included:

- *Project Access* – a collaboration with the Travis County Medical Society that coordinates voluntary care by 870 physicians (primary and specialist) as well as hospital care, diagnostic services and medication assistance for the low income uninsured.
- *Katrina Help Line* - a single telephone line for Katrina evacuees and social services professionals to source referrals to area primary care clinics and to help eligible evacuees obtain health care funding through Medicaid and other state and local programs.
- *Dental Sealant Day* – A community-wide volunteer program providing free dental sealants for indigent children.

INITIATIVES TO IMPROVE QUALITY OF CARE

Coordinated Case and Disease Management Programs

A key priority of the ICC members is to improve the quality of care delivered to its uninsured and underinsured population. (Exhibit 7) Providing care for patients with complex, chronic health conditions becomes even more complicated when patients lack a medical home, with care typically being fragmented, incomplete and focused on stabilizing acute situations. Capturing longitudinal records from all the safety net providers in the region, the ICC database allows patients with high utilization rates or unmanaged conditions to be identified so that the ICC members can design and evaluate care coordination programs.

The ICC is implementing an internet-based shared disease management registry known as the Patient Electronic Care System, or PECSYS, as part of a new community-wide care coordination initiative. The registry complements data collected in the ICC database, by incorporating patient level indices not otherwise recorded (e.g., body mass index (BMI), Asthma Action Plans, and encounters with case managers) and by incorporating evidence-based guidelines into the system tools. Consensus was obtained from the member organizations regarding the standards of practice to be enforced as well as the data elements and outcome measures to be captured, to maximize coordination of care and to facilitate program evaluation. The PECSYS software has also been customized for the ICC to allow capture of Diabetes Passport and other Health and Nutrition education class programs so that all aspects of preventative and proactive patient care may be accessed from one site.

Current programs using PECSYS include an asthma education program in one ICC member location and a pilot clinical pharmacist program providing a medication therapy management service for patients with asthma and hypertension. By accessing customized ED utilization reports via personal ICC webpages (MyEpic), providers can target high-risk patients for enrollment in such programs. Patient encounter data in the ICC data repository provide objective data so that the cost-effectiveness of such initiatives may be measured. To date, reductions in ED visits and inpatient admissions of 60 and 80 percent, respectively, have been demonstrated for patients completing the asthma education program. The ICC database is also being used to evaluate the effectiveness of an integrated behavioral health program (E-Merge) which facilitates the management of mild to moderate mental health disorders in the primary care setting. This program is provided as a collaborative effort between the FQHCs and the County Mental Health and Mental Retardation center, with use of encounter data captured in the ICC database to measure the impact of program participation on service utilization. In a preliminary evaluation of patients completing this program, ED visits and non-mental health related clinic encounters declined by 16 percent and 30 percent, respectively, when service utilization for the 12-month intervals pre- and post-program completion were compared.

The goal of the ICC is to replicate these initiatives community-wide to maximize the continuity and quality of care so that indigent patients with chronic disease may be managed in a more efficient and effective way.

OPPORTUNITIES

The ICC continues to develop the capacity of the ICC system, and interfaces for a number of the newer ICC members are currently being completed, while existing interfaces are being reevaluated to see if there are additional data elements that may be captured. A priority for 2006-7 has been the development of laboratory interfaces to capture results data, such as Hemoglobin A1C levels for diabetic patients. Such data will help the ICC identify possible duplication of services within the system and provides the opportunity to identify patients for case or disease management (e.g., those with poorly controlled diabetes), and to monitor the impact of such programs on patient outcome.

The incorporation of public health records into the ICC data repository is in the planning phase. Combining vaccination records and infectious diseases reports into the patients' health records will greatly enhance opportunities for public health outreach and surveillance programs in this historically difficult-to-track population.

The goal of the ICC is to provide a more complete picture of the care sought by, and provided to, the medically indigent in Central Texas. Addition of these new data elements will further enhance the ICC database as a valuable resource to support program development and evaluation.

CHALLENGES

The ICC faces challenges relating to the quality, integrity and validity of the ICC database as a comprehensive source of health records for the medically indigent in Central Texas. As for any database, the ICC database is limited by the completeness and veracity of the data submitted. The risk of coding errors and data inaccuracy is of particular concern in this environment, as much of the encounter data for patients receiving uncompensated care is not used for billing purposes. This may lessen the incentive for providers to accurately capture patient encounters. A routine process for validating the accuracy of the data included in the ICC database is under development, to include reviews of data entry practices by provider staff in the various organizations. As is the case in the broader community, little is known of the extent to which patients may obtain health care or medications from other regions or from non-traditional providers, or the extent to which complimentary or alternative medicine are used by this population. A survey of patient-reported health care utilization would serve to validate the completeness and integrity of the database.

Data can only be captured electronically if it is stored electronically, and a few of the ICC members still operate with paper-based records. Fully operational electronic medical record systems (EMRs) are expensive and beyond the budget of many non-profit community providers. An initiative to investigate the group purchase and licensing of an EMR system to be shared among the smaller ICC member clinics is currently underway. These initiatives are important to improve the completeness of the ICC system, and to capture all patient encounters, regardless of the source of care so that the burden of disease in the community is accurately described and the validity of program evaluations can be maximized. The practice of withholding data from the ICC database because of concerns regarding patient confidentiality has been limited primarily to the exclusion of HIV-related data. Subject to the use of additional security measures, one provider has recently agreed to inclusion of their mental health encounters in the database, while another provider is exploring the use of this added security with regard to inclusion of encounter data for teenage patients. Patient confidentiality is of paramount importance to the ICC, and as previous noted, no encounter data is shared between provider groups without signed patient consent.

Many of the initiatives implemented by the ICC to date are in their infancy. The need for systematic and rigorous evaluation of all programs is recognized, so that the return-on-investment in terms of improvements in the quality or decreases in the cost of care may be documented. Further research is also needed to identify high-risk patients and their characteristics, so that disease and case management initiatives may be developed to improve the quality and cost-effectiveness of care provided to this group. While initially funded through grant sources, future funding will primarily be generated by a three-tier membership dues model. This model operated in a voluntary capacity in 2006, and a formal model has been approved by all member organizations for 2007. This move confirms the perceived value of the ICC database, in particular, and the collaboration as a whole to the member organizations. Acknowledging this, it is important that a consensus regarding the goals, strategies and functions of the ICC continues to be developed. Recognizing that resources are limited, and acknowledging that there may be many worthwhile health care initiatives, it is important to consider the potential quality and effect of these programs, so that programs with the highest impact for the community as a whole receive priority.

SUMMARY

Increases in the numbers of uninsured and underinsured patients, and in the cost of caring for them, threatens the viability of the health care system. The situation in Texas is particularly challenging and mandates innovative programs that address access and quality of care for the medically indigent at a community-level.

Operating one of the few fully functioning HIE in the country, and by means of a series of innovative programs to address the access and quality of care provided to the medically indigent, the ICC is an example of what can be achieved by community-wide provider collaboration. The ICC database combines the encounter records of all uninsured and underinsured patients who receive care from the area safety-net providers, serving as a rich data source at the point-of care for practitioners. The database also serves as a resource for health services research, allowing patterns in health care utilization to be tracked and for the identification and evaluation of quality improvement programs. Through a number of programs addressing access to care, the ICC has successfully enabled over 37,000 patients to access care through federal, state and local funding programs, and almost 5,000 patients to obtain free prescription medications, with others obtaining subsidized medications through expansion of the 340B programs. New community-wide care coordination initiatives focus on providing a coherent, standardized approach to patient case and disease management, with the goal of providing quality, effective health care in a cost-efficient manner.

Exhibit 1: Characteristics of Indigent Care Collaboration (ICC) Member Organizations

Organization	Organization Type	Population and Service Type
Hospitals and Hospital Systems		
Austin Women's Hospital ¹ (University of Texas Medical Branch)	Public, non-profit organization	General Hospital providing obstetrical and gynecological care for women.
Central Texas Medical Center ¹	Private, non-profit organization	Full Service Hospital serving general population and medically indigent.
St. David's Healthcare Partnership	Private, for-profit organization	Emergency and Acute Inpatient Care, Outpatient Surgery, Rehabilitation Services, Mental Health Inpatient Care for the general population including the medically indigent.
John's Community Hospital ¹	Private, non-profit organization	Urgent and Acute Care Hospital serving the general population including the medically indigent.
Seton Family of Hospitals	Private, non-profit organization	Emergency and Urgent Care, Acute Inpatient Care, Outpatient Surgery, Mental Health Inpatient Care for the general population including the medically indigent; and Primary Care Clinics for the uninsured.
Community Clinics		
Austin/Travis County Mental Health and Mental Retardation Center	Publicly-funded, non-profit organization	Community-based and inpatient Mental Health, Mental Retardation and Substance Abuse services for the general population including the medically indigent with serious mental illness.
City of Austin Community Care Services Department	FQHCs ²	Primary Care, Dental Care, Behavioral Health, and HIV/AIDS Treatment for low-income, insured and uninsured adults and children.
El Buen Samaritano	Private, non-profit organization	Primary Care, Maternity Care and Preventative Care for low-income, uninsured Hispanic adults and children.
People's Community Clinic of Austin	Private, non-profit organization	Primary Care for uninsured and underinsured children and adults.
Planned Parenthood of Texas Capital Region	Private, non-profit organization	Family Planning, Sexual and Reproductive Health Services for both the uninsured and underinsured.
Lone Star Circle of Care	FQHC ²	Primary Care for low-income uninsured and underinsured adults and children.
Round Rock Health Clinic ¹	Private, non-profit organization	Primary Care for low-income uninsured adults and children.
University of Texas School of Nursing: Children's Wellness Center (CWC) ¹ Community Women's Wellness Center ¹	Public, non-profit organization	– Primary Care for low-income and medically indigent children. – Health Screening, Promotion and Maintenance for low-income uninsured and underinsured women aged ≥40 years.
Volunteer Healthcare Clinic	Private, non-profit organization	Primary Care for low-income, uninsured Hispanic children and adults.
Public Health Departments, Health Districts and Professional Societies		
Austin/Travis County Health and Human Services Division ¹	Government organization	Public Health Services for the general population.
Travis County Healthcare District ³	Government organization	Health District
Williamson County and Cities Health District ¹	Government organization	Public Health Services for the general population.
Travis County Medical Society	Private, non-profit organization	Coordinates volunteer Primary and Specialty Care for the low-income uninsured.

¹. Scheduled to begin data contribution to ICC database in Spring 2007.

². Federally Qualified Health Centers.

³. Payer organization - does not capture patient-level data for inclusion in the ICC database.

Exhibit 2: Relationship between Contributing Groups and the Development of the Indigent Care Collaboration (ICC) Centralized Data Repository.

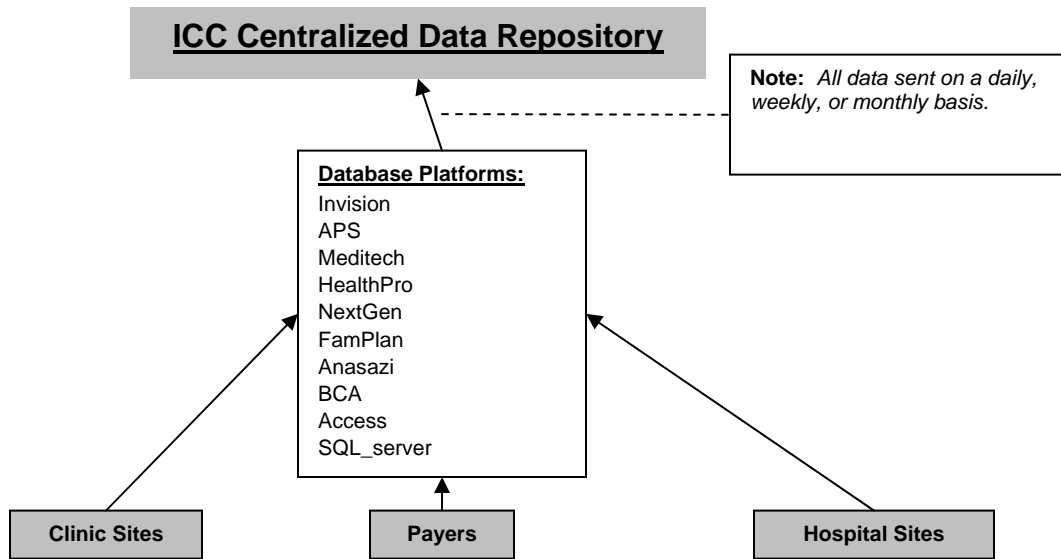


Exhibit 3. Data Fields included in the Indigent Care Collaboration (ICC) Database	
Data Field	Data Contents
Master Patient Index	Patient name, Date of Birth, Gender, Social Security Number, Medical Record Number
Demographic	Address, Telephone number(s), Primary Language, Race/Ethnicity, Marital Status, Primary Care Provider
Medical Information	Medical Diagnoses, Medical Procedures
Financial	Payer, or funding program (e.g., Medicaid, CHIP, or various locally funded programs)
Encounter	Encounter Type (ED, Inpatient, Clinic visit, etc.), Visit date, Location, Attending provider, Admit and discharge date, Time of day
Pharmacy	Prescription start and end date, Prescribing provider, Amount ordered, Number of refills allowed, National Drug Code (NDC) and name of medication, Dispense date and amount, Prescription number

Exhibit 4: Demographic Characteristics of Uninsured and Underinsured Patients Visiting Indigent Care Collaboration (ICC) Providers in 2005			
	Female	Male	All
All Patients			
Number of Patients (%) ¹	121,188 (61.7)	75,176 (38.3)	196,442 (100.0)
<i>Race / Ethnicity %</i>			
African-American	11.6	12.3	11.9
Caucasian	36.3	29.0	33.5
Hispanic / Latino	39.9	43.2	41.2
Other ²	1.7	1.2	1.5
Unknown / Not specified	10.4	14.2	11.9
Number of Patient Visits n (%) ¹	403,309 (67.8)	191,130 (32.1)	594,685 (100.0)
Average Encounter Rate ³	3.3	2.5	3.0
Patients Aged 0 to 17 Years			
Number of Patients (%) ¹	33,169 (50.8)	32,150 (49.2)	65,338 (100.0)
Number of Patient Visits n (%) ¹	77,071 (50.9)	74,267 (49.1)	151,361 (100.0)
Average Encounter Rate	2.3	2.3	2.3
Patients Aged 18 to 44 Years			
Number of Patients (%) ¹	70,120 (69.8)	30,303 (30.2)	100,433 (100.0)
Number of Patient Visits (%) ¹	241,088 (78.8)	64,831 (21.2)	305,774 (100.0)
Average Encounter Rate ³	3.4	2.1	3.0
Patients Aged 45 to 64 Years			
Number of Patients (%) ¹	14,216 (56.7)	10,852 (43.2)	25,093 (100.0)
Number of Patient Visits (%) ¹	67,279 (60.6)	43,595 (39.2)	111,123 (100.0)
Average Encounter Rate ³	4.7	4.0	4.4
Patients Aged 65 Years or Older			
Number of Patients (%) ¹	3,683 (66.0)	1,871 (33.5)	5,578 (100)
Number of Patient Visits (%) ³	17,871 (67.3)	8,437 (31.9)	26,427 (100)
Average Encounter Rate ³	4.9	4.5	4.7

¹. Some numbers may not be additive across rows due to a small number of patients with unspecified gender that are included in the last column.

². 'Other' includes American Indian / Eskimo, Asian /Pacific Islander and Multi-Racial.

³. Gender disparity persisted after correcting for encounters related to pregnancy and reproductive health.

Exhibit 5: Pattern of Emergency Department (ED) Utilization by Uninsured and Underinsured Patients Attending Indigent Care Collaboration (ICC) Providers in 2005, Stratified by Age and Gender

Age Band (Years)	0-17	18-44	45-64	≥65	All
ALL PATIENTS WITH ED ENCOUNTERS					
Number of Patients (%)¹					
Female	17,097 (35.1)	25,077 (51.5)	5,920 (12.2)	584 (1.2)	48,678 (100.0)
Male	18,593 (41.2)	20,745 (46.0)	5,380 (11.9)	357 (0.8)	45,075 (99.9)
All	35,690 (38.1)	45,822 (48.9)	11,300 (12.1)	941 (1.0)	93,753 (100.1)
ED Encounter Rate					
Female	1.5	1.6	1.7	1.4	1.6
Male	1.5	1.5	1.8	1.3	1.5
All	1.5	1.5	1.7	1.4	1.6
Patients with ED Encounters as a % of All Patients with Encounters					
Female	51.5	36.2	42.4	15.9	40.5
Male	57.8	70.3	50.1	19.1	60.7
All	54.6	46.4	45.7	16.8	48.2
PATIENTS WITH ED ENCOUNTERS ONLY					
Number of Patients (%)¹					
Female	10,352 (40.6)	12,535 (49.1)	2,368 (9.3)	262 (1.0)	25,517 (100.0)
Male	11,164 (37.4)	15,809 (52.9)	2,700 (9.0)	201 (0.7)	29,874 (100.0)
All	21,516 (38.8)	28,344 (51.2)	5,068 (9.1)	463 (0.8)	55,391 (99.9)
ED Encounter Rate					
Female	1.3	1.3	1.2	1.0	1.3
Male	1.3	1.3	1.2	1.1	1.3
All	1.3	1.3	1.2	1.1	1.3
Patients with ED Encounters only as a % of All Patients with Encounters					
Female	31.2	18.1	17.0	7.1	21.2
Male	34.7	53.5	25.2	10.7	40.2
All	32.9	43.4	20.5	8.3	28.4

¹ Some percentages across rows may not add to 100.0, due to rounding.

Exhibit 6: Emergency Department Encounters as a Percentage of All Encounters for Uninsured and Underinsured Patients Accessing Care through Indigent Care Collaboration (ICC) Providers in 2005, Stratified by Age, Gender and Race				
	0-17 Years	18-44 Years	45-64 Years	≥ 65 Years
Gender ¹				
Female	33.6	17.2	15.3	4.5
Male	38.0	48.1	21.7	5.5
Race / Ethnicity				
African American	50.3	38.0	19.2	3.3
Caucasian	45.2	25.1	20.4	7.0
Hispanic Latino	29.0	15.0	12.6	3.4
Other ²	37.0	11.8	10.5	4.2
Unknown	48.1	46.7	27.8	11.1

¹ Gender difference persisted after correcting for encounters related to pregnancy and reproductive health.

² ‘Other’ includes: American Indian / Eskimo, Asian American / Pacific Islander and Multi-Racial.

Exhibit 7. Community Initiatives to Improve Access and Quality of Care for the Indigent Care Collaboration (ICC)	
Program	Purpose
Medicaider™	Customized online screening tool allowing simultaneous screening for eligibility in all available federal, state and local programs.
Insure-a-kid	Follow-up service to assist individuals eligible for federal, state or local programs obtain, use and renew their health care funding.
Patient Prescription Assistance Program (PPAP) Screening Tool	Online screening tool integrated into Medicaider™ link allowing rapid eligibility screening and application processing for all available PPAP programs.
Advocacy	Campaigned for the creation of the Texas County Healthcare District, a dedicated tax base to fund county-wide health care for the indigent and facilitate coordination and planning of care in the district.
Regional Planning	Provision of studies and analyses including capacity and utilization reports to aid health care planning in the district.
Other Initiatives :	
Project Access	Program that coordinates volunteer physician care, specialty care, hospital care, diagnostic services and medication assistance.
Katrina Help Line	Dedicated phoneline for Katrina evacuees in Central Texas assisting with primary care referrals and eligibility enrollment for federal, state and local programs.
Dental Sealant Day	Program coordinating care from volunteer dental professionals for indigent children.
Coordinated Community-Wide Case and Disease Management	Internet-based shared registry capturing detailed data to support disease management programs in the community, and using the ICC database to support and evaluate case and disease management programs.

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