

**Accreditation Preparation &  
Quality Improvement  
Demonstration Sites Project**

**Final Report**

**Prepared for NACCHO by the Lee  
County Health Department, IA**

**November 2008**

### **Brief Summary Statement**

Lee County Health Department (LCHD) is located in Southeast Iowa and serves a primarily rural population of about 36,336. Using the NACCHO LHD Self-Assessment Tool for Accreditation Preparation and a quality improvement process, LCHD organized a QI team to complete a *Plan Do Study Act* cycle to work on the agency's capacity to improve *Standard III-C: Provide Health Information to Individuals for Behavior Change* within the agency's Maternal Child Health (MCH) Program. As a result, a core QI team created an attractive binder to use for marketing MCH services to targeted medical providers for increasing awareness of our services and linking additional families/children to needed health care systems. Results included 70% of all targeted providers agreeing to an in person presentation by a trained staff member resulting in 7 additional providers having increased awareness of our MCH program services and referral processes for linking families/children to care.

### **Background**

LCHD requested NACCHO funding to assess its capacity for becoming a future nationally accredited local health department. With the support of our Board of Health, LCHD has developed a genuine interest in learning the *capacities* of Lee County's public health system and *how well* LCHD and/or community partners are providing the 10 Public Health Essential in the county. Through this project LCHD's initial hope was to identify strengths and weaknesses and prioritize opportunities for improvement against a set of optimal national public health performance standards.

Through completion of the agency's self-assessment process and learning how to implement a QI process (PDSA cycle), LCHD was able to identify specific strengths and weaknesses and prioritize areas to focus on in the near future within current funded programs, services, staffing, operations, and public health responses in preparation for voluntary public health accreditation in 2012.

LCHD is governed by the Lee County Board of Health, and is well known for its quality services and established community partnerships. LCHD currently has 36 employees with an operating budget of 2.9 million. LCHD's services are paid for by Medicare, Medicaid, contracts and grants with only 3% of the total operating budget funded by county tax dollars. Many of the essential services LCHD currently provides are a result of identified health needs gathered from on-going community health needs assessments and health improvement planning efforts of community partners. LCHD has a strong reputable history of advocating for and implementing projects or services based on county needs that have been sustained in the community for many years.

### **Goals and Objectives**

#### **LCHD's Final AIM statement for the QI Process**

By October 31, 2008, LCHD will increase awareness of Title V/MCH care coordination services by meeting with at least one provider's office in each county of the Title V/MCH service area.

Other project goals and objectives during the project period with no changes identified:

1. Completion of the NACCHO LHD self-assessment tool by May 15, 2008 to identify LCHD's strengths and weakness and at least one priority focus area to improve during the project period in 2008.
2. Initiate a contract with a QI consultant to help LCHD QI staff learn to apply QI processes and utilize QI tools by July 2008.
3. Host a two-day QI workshop in August 2008 facilitated by the QI consultant to teach the QI team how to use QI tools during the planning, implementation, and completion of the PDSA cycle focusing on marketing MCH services in the service area to providers.
4. Plan, implement and complete the MCH QI PDSA cycle by November 30, 2008.
5. Complete all required reports and submit to NACCHO by November 30, 2008.

6. Participate in all required NACCHO conference calls.
7. Submit a model practices application by November 30, 2008.

### Self-Assessment

LCHD first organized a NACCHO Self-Assessment QI team in April 2008 consisting of the agency's administrator, five program directors and three staff nurses representing different programs within the agency. Once assembled, the assessment team met to discuss the best options for completing the self assessment process using the *Operational Definition of a Functional Local Health Department's Assessment Tool*. The team agreed that each individual member would go through the assessment tool on their own scoring in each of the standards and documenting any feedback/comments on the use of tool. Once each assessment team member completed their own assessment (which took anywhere between 2-3 hours by each member), the team met again to discuss, review, and compare all scores as well as share feedback on the utility and relevance of the tool. This process occurred over a course of three team meetings lasting approximately two-three hours each. As an end result, the assessment team agreed on one final score for each area reviewed along with documentation of combined feedback for the evaluation component of the metrics tool. The Community Health Director was appointed to compile all the scores and comments into one document. All results of the completed assessment tool were then submitted to NACCHO by the deadline of May 15, 2008 as well as the Metrics Survey evaluation by May 29, 2008. One barrier LCHD did face was the ability to enter assessment scores/comments on their own in the on-line software (nacho.insightformation.com). As a result, NACCHO provided necessary technical assistance to enter all the data scores for LCHD after several phone call and emails. From that point on, LCHD was then able to print color-coded reports with calculated scores creating a nice visual for the team to analyze the results and identify specific areas of improvement/priority area(s) to address for the remainder of the project period. The following were the chosen priority standards to focus on after careful analysis and deliberation of the assessment team members:

1. **Standard III-B: General Data and Information Exchange on Issues Affecting Population Health**
2. **Standard III-C: Provide Health Information To Individuals For Behavior Change**

#### Highlights from Self-Assessment Results

Standard/ Indicator #	Standard and Significance
Standard II A-G	<b>Protect People from Health Problems and Health Hazards</b> This entire standard was a strength area for LCHD as the agency scored 3-4 on all areas for standards IIA-IIG. The agency works very well with other community partners to address public health issues such as communicable disease response, investigations, surveillance and control; emergency preparedness planning and exercises; public health response planning and communication development for the protection of people from infectious disease and other potential public health hazards.
Standard III- B.2	<b>General Data and Information Exchange on Issues Affecting Population Health</b> <b>LHD continuously develops current info on health issues that affect the public.</b> This was an area of weakness for LCHD, as identified through the self-assessment. After discussion, The assessment team agreed this standard would be one to address through our QI process.
Standard III- B.4	<b>General Data and Information Exchange on Issues Affecting Population Health</b> <b>LHD uses social marketing to understand the info needs of specific populations</b> This was an area of weakness for LCHD, as identified through the self-assessment. After discussion, LCHD felt this standard would be one to address through our QI process by developing an educational/marketing booklet for providers and then following a marketing plan to target physician offices in the MCH service area to increase access of MCH clients (Medicaid, Uninsured, underinsured families) needing medical and dental health care and other support services in the community.
Standard III- C.2	<b>Provide Health Information To Individuals For Behavior Change</b> <b>Staff has capacity to create materials and campaigns to improve health behaviors</b> This was also an area of lower scoring, LCHD felt this standard would be another one to address through our QI process by having all MCH staff members participate in the development of the educational/marketing booklet for providers with a presentation to be made to address how LCHD can

	assist with linking pregnant women and children to health care systems to improve health behaviors.
<b>Standard III-C.4</b>	<p><b>Provide Health Information To Individuals For Behavior Change</b></p> <p><b>LHD assesses the target population for how they accept information</b></p> <ul style="list-style-type: none"> <li>This was also an area of lower scoring, but LCHD plans to assess for this information in a future PDSA and did not make it part of this project.</li> </ul>

## Quality Improvement Process

**AIM Statement:** *By October 31, 2008, LCHD will increase awareness of Title V/MCH care coordination services by meeting with at least one provider's office in each county of the Title V/MCH service area.*

**PLAN:** After completion of the self-assessment process and with focus areas identified, the agency administrator began the lengthy process of contracting with a QI consultant to utilize for the remainder of the QI process and project period. Michelle Gourdine, MD signed a contract approved by the Lee County Board of Health in July 2008. A copy of the self-assessment scores and priority areas were sent to Dr. Gourdine for review. A conference call was then held with Dr. Gourdine between the agency's Administrator and Community Health Director to discuss the focus areas selected and to determine the next direction to go for completing at least one *Plan Do Study Act* cycle. It was decided that a two-day workshop on-site at LCHD would occur facilitated by Dr. Gourdine to teach agency staff involved in the QI project the *Plan-Do-Study-Act* process, set the aims for systems improvement, establish measures for improvement, and identify the changes most likely to result in improvement. Due to the short time period for completing the PDSA cycle, it was decided to narrow the agency's focus to just one agency program—the Maternal Child Health (MCH/Title V) program. The QI workshop was scheduled for August 18-19, 2008 requiring two full days of staff time to participate in the training and develop the QI *Plan* component of the PDSA cycle. Dr. Gourdine also made the recommendation to the agency's QI team leaders to order and review QI tools that were available for use which included the *Public Health Memory Jogger II* and *Embracing Quality in Local Public Health: Michigan's Quality Improvement Guidebook* as well as various worksheets created by the New Hampshire Department of Health and Human Services on the *Plan Do Study Act process*. All of these were either ordered or downloaded off the internet for review and were used by the QI team throughout the process. Once the workshop date was set, additional staff members from the MCH program were asked to join the QI team to participate in the workshop and become actively involved in the QI plan and processes. An invitation was also sent to the Iowa Department of Public Health's (IDPH) lead consultant, Janet Beaman to participate in the scheduled workshop as well. The following documentation describes the processes and outcomes of the two-day workshop that occurred in August 2008 at LCHD, facilitated by Dr. Michelle Gourdine, MD with descriptions of QI tools used during the process:

### QI site visit—Day One (August 18, 2008):

- Introductions and an overview of all LCHD services were presented to the consultant with additional details provided about the MCH program in the Title V service area.
- An overview of the *Plan Do Study Act* process was presented to all workshop participants by Dr. Gourdine with everyone developing a basic understanding the PDSA cycle.
- A discussion of the priority focus areas was then held to develop a ***Definition of a problem concerning the agency's identified focus areas in Standard III:***

**Standard III: Inform, educate and empower people about health issues**  
**(III-B: General Data and Information Exchange on Issues Affecting Population Health)**  
**(III-C: Provide Health Information To Individuals For Behavior Change)**

Each workshop participant (through a round table discussion) stated possible problem ideas in LCHD'S MCH/Title V program in regards to Standard III. Problem areas discussed in the process were:

- Informing parents of when their children's well child screens are due (***education***)

- Increasing medical home rates (provider education, coding, etc.) (*medical home rate*)
- Increasing the number of Medicaid children who are informed of EPSDT benefits (*education*)
- Linking children to needed care (*linking children to care*)
- Inform providers of care coordination services available through LCHD (*education*)
- Increasing EPSDT participation rates to 80% (*linking children to care*)
- Ensure adequate funding for required programs (*education*)
- Is medical home rate a realistic measure given the population served (*medical home rate*)
- How do we find the hard to reach (how to count/numbers; methods; scheduling to reach “after regular LCHD hours”) (*education*)
- How to reframe the medical home rate questions in format that is understandable by the population we’re trying to reach (*medical home rate/health literacy*)
- How to decrease no-show rate (making and keeping appointment with coordinator and the doctor) (*education?*)
- How to provide provider education to increase awareness (*education*)
- Educate parents about importance of health care and prevention and find best way to educate hard to reach parents (*education*)
- How to distinguish LCHD from the stigma of DHS (*LCHD identity*)
- How to overcome clients’ geographical concerns (Why is Lee County in my county?) (*LCHD identity*)

**A Draft AIM statement was then developed upon conclusion of problem identification:**

*“Educate the community on the importance of the health and well-being of children, adolescents and young adults, and how LCHD can link families to care.”*

- An **Affinity diagram** was then utilized to brainstorm for **root causes of the problems identified** which included:
  - An arrangement of ideas into groups (see groups listed below)
  - Creation of header cards (see below)
  - Sorting categories into those that are under LCHD’s control and those that are not under LCHD’s control
  - Ideas were grouped under the following headings: resources, priorities, process, marketing, and time
  - Staff then processed what LCHD had control of and did not have control of:

**In Control**

Marketing  
Process  
Priorities

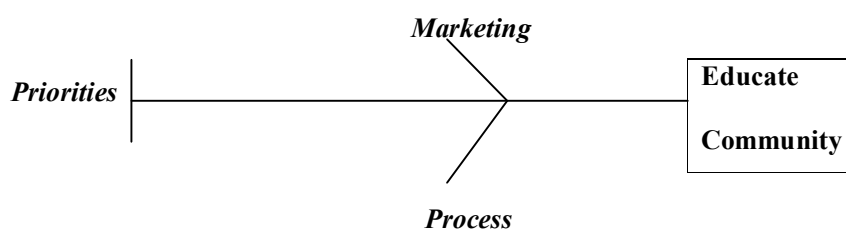
**Out of Control**

Time  
Resources

**QI site visit—Day Two (August 19, 2008)**

- The team reviewed the **affinity diagram** posted on the wall completed the day before.
- The team decided to keep 5 main categories; moved a few ideas around to fit into more appropriate categories
- Kept in-control and out of control groupings.

The team then decided to focus on the *in-control groupings* and utilized a **fishbone diagram**



**Head of fish:** draft aim statement was the head of the fish

**Branches:** *marketing, priorities, and process* were the bones of the fish that branched out

The team then fleshed out each fish bone “branch” and then devised a **flow chart of the current Process** to help flesh out the “process” branch of the fishbone (refer to MCH PROCESS Flow Chart Appendix C).

As a final result and after much team **brainstorming** the team chose the focus area for the QI project to be:

**Marketing MCH services**

The team then identified 5 *marketing opportunities (improvement theories)* ranked according to feasibility, cost, baseline data, data collection, and clear outcomes

**Marketing Improvement Theories**

- If we develop and improve LCHD’s Website (inclusive of MCH services) then more people would be educated about our services increasing awareness.
- If we narrow the target audience focus to where the MCH participation rates are lowest then we may be able to increase our outreach efforts to a targeted group increasing our percentages in these areas.
- If we develop a new identifier for MCH services then people may understand why LCHD is providing services in other counties than just Lee.
- If we communicate staff meeting minutes to others in the department and other MCH county partners, then program communication will improve.
- If we increase our partnerships with medical and dental providers to raise awareness of MCH services, then we will receive referrals and be able to link additional families and children to needed care.

The team then sorted the improvement theories according to feasibility (easiest to hardest) and cost (cheapest to most expensive); and availability of baseline data, ease of data collection, clear outcomes, and the NACCHO deadline which were as follows:

**Feasibility (including data) easiest to hardest to do expensive to do)**

Communicate to dept and other counties  
Narrow target  
Increase partnerships with providers  
Website  
New ID

**Cost (least expensive to most**

Communicate to dept and other counties  
Narrow target  
Increase partnerships with providers  
New ID  
Website

**The team then chose to focus on: INCREASE PARTNERSHIPS WITH PROVIDERS as primary improvement theory for the PDSA cycle.**

**Methods to do this:**

- Meetings with doctor’s offices to explain MCH services
- Drop off information/educational packet explaining MCH services
- Face to face follow up in 1 week
- Use resource list of doctor’s offices
- Target Family Practitioners, Pediatric Physicians, and Community Health Centers first
- Track Number of appointments made to meet with doctor’s offices and explain program services and referral processes
- Explain appropriate well child exam coding

**An Interim AIM Statement was then developed:**

*Increase partnerships with providers to raise provider awareness of LCHD care coordination program and get referrals.*

**The group then discussed and agreed upon the 4 key elements of the final AIM statement:**

1. **What:** increase partnerships; provide awareness of MCH services
2. **When:** by October 31, 2008
3. **How much:** Target at least one doctor's office in each county of MCH/Title V service area
4. **For whom:** the providers

The team then decided upon the final AIM statement using the four key elements:

**Final AIM Statement:**

***By October 31, 2008, LCHD will increase awareness of Title V/MCH care coordination services by meeting with at least one provider's office in each county of the Title V/MCH service area.***

The team then completed an **Action Register** and assigned core QI team members activities for the remainder of project period with a completed timeline up to 11/30/08

***ACTION REGISTER***

<b><u>What</u></b>	<b><u>Who</u></b>	<b><u>By when</u></b>
Meeting memory	Fiscal Director	Ongoing
Schedule meetings	Community Health Director	As needed
Schedule teleconf. w/ consultant	Core team and consultant	As needed up to 11/30
Build format for final report/storyboard	Team and consultant	Nov. 15, 2008
Complete model appl. 2008	Team (Michele is leader)	Nov. 30,

*Documentation of change and if resulted in improvement:*

The NACCHO Core QI team met and decided on the following for the project's QI plan for the PDSA cycle and developed the following **Evaluation and Data Description Summary**:

**Evaluation and Data Description Summary for measuring results of QI project:**

**Statement of the Measure: By October 31, 2008, LCHD will increase awareness of Title V/MCH care coordination services by meeting with at least one provider's office in each county of the Title V/MCH service area.**

1. What is the target population? 10 Physician offices located in Lee, Des Moines, Davis, Van Buren, and Jefferson Counties who serve Medicaid, uninsured/underinsured pregnant women and children 0-21.
2. What are the numerator and the denominator for this specific measure? Currently 0 physicians groups have received a presentation or information packets regarding MCH/Title V services in the five counties. We would like to change this to 10 providers receiving the information and offered a presentation on our services in order to increase awareness and establish a referral network. We will target 10 offices with at least 60% of them accepting a presentation. (0/10 is baseline measure; 6/10 is what we are striving for).
3. What is the target or goal for performance? We are striving for at least 6 of the 10 targeted offices will accept our information and receive a presentation (60%) and at least one from each county will accept 5 of 5 (100%).
4. Who will collect this information? Each core QI team members assigned to delivery of the books and presentations will track their own outcomes using a tracking log created for the project.
5. In what form or what tool will be used to collect these data? A tracking log tool has been created for staff to track the information and turn in to the Community Health Director.

6. How often will the data be collected? Reporting period- calendar year or every quarter?  
Assigned staff will track the data and turn in the tracking log when completed with the final deadline being October 31, 2008.
7. Who will conduct the data analysis? Michele Ross, Community Health Director will enter data into a table.
8. How often does program staff want analysis reports to review and take action? At the end of the project deadline.

<b>LCHD's NACCHO QI plan for August through October 2008</b>	
Statement of Measure	0% of providers in the MCH service area have received information/educational packets nor an in-person presentation on MCH services. 0% were referring to the MCH program for linking families to care prior to the QI project.
Target Population	10 physician offices in five-county service area who serve underserved pregnant women and children 0-21 in the LCHD's MCH service area
Numerator:	# of targeted physician offices who received MCH marketing booklet and accepted a presentation by an assigned staff member
Denominator:	# of targeted Physician offices

Prior to the QI Process, LCHD had not received any referrals from provider offices in the service area for MCH services nor were any presentations being offered to market MCH services in the service area. The number of successful presentations made to review MCH services and referral processes as well as any referrals received would be the desired improvement.

**DO:** The core QI team for the *Plan Do Study Act* cycle met as needed to plan for how the QI process would be implemented and to assign roles and responsibilities. A work plan *Matrix* document was developed to use at all meetings to record minutes, activities assigned with due dates, and the core members who were assigned specific responsibilities. In addition a *tracking log* was developed to monitor and document process of the actual action steps outlined as follows that occurred during the STUDY-ACT components of the PDSA cycle:

1. The entire QI team met to discuss what to include in the educational/marketing packets for providers that would be targeted during the QI project that LCHD chose for educating and increasing awareness of our agency's Title V/MCH services and referral processes for linking children/families to care. MCH staff were assigned the task of summarizing MCH/Title V services and submitting written information to the agency's assigned marketing person who was then charged with compiling the information into one nicely designed marketing booklet. Once a draft booklet was designed it was reviewed again by the core team.
2. The team leader of the core QI team then submitted one completed educational packet to be approved for use by the Iowa Department of Public Health (IDPH) before final printing and distribution of all booklets. The original was approved with minor changes by IDPH with positive feedback from the state health department (as a result the agency was asked to share the final product with other MCH providers at the state's fall MCH conference in early October).
3. The core QI team then produced several booklets together in a creative format that was ready for use with educating providers in each county.
4. The core team then identified 10 provider offices in the five county service area to be targeted and by what staff members. Lee County (4 offices); Davis (1 office); Des Moines County (3 offices); Jefferson County (1 office) and Van Buren County (1 office). Lee and Des Moines Counties are fairly large counties with additional services to offer thus the decision was made to target more than one office in these counties.
5. The core team then developed a plan for selected staff to deliver in person the educational booklets to the targeted provider offices with set deadlines for doing this. The plan included what to say when dropping off the booklets and to address that a follow up contact would occur within one week.
6. The core team then scheduled assigned staff to make follow up calls within one week after all educational packets were delivered and that during the follow up phone call a request would be

made for an in-person presentation with the physicians/staff for hands on education and review of LCHD's MCH/Title V services and referral processes.

7. The core QI team also identified methods for tracking all QI data and for monitoring progress or barriers on a weekly basis. A tracking log was provided to all staff involved for monitoring who they targeted, drop off dates, follow up call dates/outcomes, barriers, and presentation dates/outcomes.

**CHECK/STUDY:** By October 31, 2008, of the 10 provider offices targeted, 7 (70%) agreed to a follow up in-person presentation to increase their awareness of LCHD's MCH/Title V services and referral process. Many of the offices made positive comments of their increased understanding of the services available and of the referral processes and would make referrals if applicable. Three of the five counties (60%) had at least one presentation scheduled/provided (Lee, Des Moines, and Van Buren Counties). Jefferson and Davis Counties declined an in-person presentation but said they reviewed the booklet provided and understood more about services as it was very comprehensive. Due to the presentations being provided in late October and early November, the MCH program has yet to measure how many referrals will result (three have been received so far).

To date, the number of presentations made of those offered (70%) matched our expectations overall. However we do hope to be able to schedule presentations in Jefferson and Davis Counties at a later date since one office stated they were too busy during flu shot season to schedule a presentation, and the other stated to try back in a month or so as they were too busy as well. LCHD's core team feels that the MCH marketing booklet was of great help to the team in just organizing/capturing services in an attractive binder and to have on hand for future presentations and overviews of services. Several additional booklets have been put together with plans in place in targeting additional providers in the area in the future. The booklet was also presented to other MCH providers across Iowa during a fall conference in October. MCH providers were very interested in hearing about project results and sharing of the marketing booklets to adopt in their own counties.

**ACT:** In the next three months the core QI team will track the number of referrals as a result of these marketing contacts and presentations and do follow up with the providers in Davis and Jefferson Counties that declined a presentation (one more attempt). To date, we have received three referrals from providers who have utilized our newly developed fax referral forms. The MCH team has agreed this has been a valuable process and will be implemented with additional providers to continue with efforts for increasing awareness and improving referral processes for linking families and children to care.

LCHD also plans to develop and implement another PDSA cycle with another agency program (such as the Hospice and Home Care Program) to continue working on improving how the agency addresses Standard III as well as teaching other staff members how to utilize the PDSA model and use of QI tools the agency found useful during this project.

The agency used the affinity diagram, fishbone diagram, flow chart for process mapping, matrix model, brainstorming, Action Register, and PDSA model during the project period as described in overall summary of the two-day QI workshop facilitated by the QI consultant.

## **Results**

By October 31, 2008, of the 10 provider offices targeted, 7 (70%) agreed to a follow up in person presentation to increase their awareness of LCHD's MCH/Title V services and referral process. Many of the offices made positive comments of their increased understanding of the services available and of the referral processes and would make referrals if applicable. Three of the five counties (60%) had at least one presentation scheduled/provided (Lee, Des Moines, and Van Buren Counties). Jefferson and Davis Counties declined an in-person presentation but said they reviewed the booklet provided and understood more about services as it was very comprehensive.

In addition, an evaluation survey was administered to the NACCHO assessment and NACCHO core QI teams to evaluate the agency's participation in the NACCHO QI project. Compiled results are in appendix B.

## **Lessons Learned**

Local health departments should certainly allocate time and resources to completing the self-assessment process and learning how to do a PDSA cycle. The information an agency can obtain by completing the self-assessment process is valuable but certainly does take many hours of staff time and commitment from upper management to direct service staff to complete the process. The colorful visual printouts of the assessment results have been very useful for referencing and discussing strengths and need areas of the agency to prepare for future accreditation. We will use these printouts as we move forward with identifying other areas to address within our agency. The QI process is also valuable as it encourages team building and commitment from staff on all levels.

## **Next Steps**

In the next few months the core QI team will track the number of referrals as a result of these marketing contacts and presentations and do follow up with the providers in Davis and Jefferson Counties that declined a presentation (one more attempt).

LCHD also plans to develop and implement another PDSA cycle with another agency program (such as the Hospice and Home Care Program) to continue working on improving how the agency addresses Standard III as well as teaching other staff members how to utilize the PDSA model and other QI tools the agency found useful during this project.

## **Conclusions**

With the new QI skills and processes learned by agency staff as a result of this project, our agency will continue with its preparation for accreditation focusing on one area at a time through several QI processes in the next few years.

LCHD feels this marketing QI process was a successful endeavour. To date, we have received three referrals from providers in our service area who have utilized our newly developed fax referral form for linking children to needed care and treatment. Another provider who received a presentation has called to replenish educational brochures for women seeking prenatal care. An additional physician in one office targeted requested another educational booklet for her office as there are several providers within their practice.

## **Appendices**

*Appendix A: QI Storyboard*

*Appendix B: Project Evaluation Survey Results*

*Appendix C: MCH Process Flow Chart*