

**Annual Report**

**Planning for Healthy Babies Program® (P4HB®)**

**1115 Demonstration in Georgia**

**YEAR 4**

**Submitted to the Centers for Medicare and Medicaid Services**

**By:**

**The Georgia Department of Community Health (DCH)**

**And**

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**December 17, 2015**

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## **Executive Summary**

The Planning for Healthy Babies Program<sup>®</sup> (P4HB<sup>®</sup>), Georgia's section 1115(a) Medicaid Demonstration, was designed to expand the provision of family planning services to uninsured women capable of childbirth, ages 18 through 44 years, with family incomes at or below 200 percent of the federal poverty level (FPL). These women must not be otherwise eligible for the state's Medicaid or Children's Health Insurance Program (CHIP) programs. In addition to family planning services, women meeting the above eligibility requirements are eligible to receive Interpregnancy Care (IPC) services if they have delivered a very low birth weight (VLBW) infant (less than 1,500 grams) on or after January 1, 2011. The P4HB program also offers nurse case management/Resource Mother Outreach only services to women ages 18 through 44 years with a family income at or below 200 percent of the FPL, who delivered a VLBW infant on or after January 1, 2011, and are eligible for Georgia's Low Income Medicaid (LIM) Class of Assistance or the Aged, Blind and Disabled (ABD) Classes of Assistance. The P4HB program was designed to achieve the following outcomes:

- Reduce Georgia's low birth weight (LBW) and VLBW rates;
- Reduce the number of unintended pregnancies in the state;
- Reduce Medicaid costs by reducing the number of unintended pregnancies by women who otherwise would be eligible for Medicaid pregnancy-related services;
- Provide access to IPC health services for eligible women who have previously delivered a VLBW infant; and,
- Increase child spacing intervals through effective contraceptive use.

One unique aspect of Georgia's Demonstration is that all services are delivered through the Georgia Families Care Management Organizations (CMOs) and their networks of providers. Three

CMOs - Amerigroup, WellCare of Georgia, Inc., and Peach State Health Plan - participate in the Georgia Families program and receive a capitated per member per month (PMPM) payment per P4HB program component (FP only, IPC , or nurse case management/Resource Mother outreach).

The P4HB program was initially approved by CMS for a three year period, from January 1, 2011 through December 31, 2013, with the termination of the Program scheduled to align with implementation of the Affordable Act and its then associated Medicaid expansion. Georgia has not expanded its Medicaid program and elected to submit a formal request to CMS to extend the duration of the P4HB program. CMS has granted Georgia multiple temporary extensions of the current 1115 Demonstration while it reviews Georgia's formal P4HB extension request. Georgia is hopeful that it will receive approval of the formal extension request prior to the end of SFY 2016.

The original implementation of the P4HB program followed a multi-pronged communication plan, with engagement of the CMOs, professional associations, and the Georgia Department of Public Health (DPH) as well as direct engagement of consumers via printed and other media. At the beginning of the Demonstration, DCH projected (based on 2008 survey data) that 276,548 women would be eligible for services under the Demonstration and that by the end of Year 1, 110,620 of those women would be enrolled and 33,186 would be using services. Despite multiple engagement efforts by DCH and providers in the community, both enrollment and utilization of services by those enrolled have been much lower than expected. Using an estimate from the American Community Survey (ACS) of uninsured women with incomes at or below 200% FPL in Georgia in 2014, which corresponds to Program Year (PY) 4 of the P4HB program, approximately 5% of the estimated eligible population was enrolled in the FP only component at the end of PY4. Women 'in need' of family planning services are those who are sexually active, able to get

pregnant and not currently pregnant or trying to get pregnant as estimated by the Alan Guttmacher Institute (AGI). Adjusting the number of eligible women for the percentage ‘in need’ of family planning services, the percentage enrolled in the FP only component in PY4 was estimated at 9%. This percentage represents a substantial decline from the PY3 percentage of the estimated eligible population enrolled (11%) representing 20% of the eligible population ‘in need’ of family planning services. All of these percentages were far below the penetration of the eligible population envisioned by the state during the design and implementation of the P4HB program.

The costs of the P4HB program continued to decline in PY4, as reported in the fourth quarter (Q4) 2014 P4HB Quarterly Report to CMS. Total expenditures declined from a peak of \$5.1 million in Q3 2013 to a low of \$1.6 million by the end of Q4 2014. The member months for the FP only component peaked in Q3 of 2013 and then declined in Q4 2013 and continued to decline through the end of 2014. The PMPM payments to the CMOs totaled over \$9 million in PY4, resulting in a total of over \$43 million in federal and state funds spent for the P4HB program across the four years since implementation. The IPC component of the program saw an increase in member months, beginning in Q4 2013, which continued through Q2 2014 then declined and remained flat through the end of 2014.

In our prior annual reports and as part of the evaluation design, the evaluation team examined the early effects of the P4HB program on: 1) use of family planning services among Medicaid enrolled women and users of Title X providers; 2) trends in total number of Medicaid paid deliveries/births and birth weight distributions; 3) pregnancies and births among P4HB enrollees and infant birth weight outcomes; 4) comparisons between P4HB participants and non-participants; 5) time until next pregnancy for Right from the Start Medicaid (RSM) enrollees with an index birth between 2009 and 2014; and 6) evidence of increased management of chronic conditions among IPC

enrollees. We include use of family planning services at Title X providers as a topic in this and earlier reports in recognition that Title X clinics are central to providing access to family planning services for women in the income range targeted by P4HB and that, in order for the P4HB program to increase overall use of family planning services, P4HB enrollees must represent new users of family planning services rather than those formerly using Title X funded services. In an earlier report we noted a significant increase in the probability of use of LARC methods among those with Title X visits in the income range targeted by P4HB indicating that perhaps due to increased revenues from the P4HB program, Title X providers could more readily purchase and provide these effective forms of contraceptives.

In this fourth Annual Report, we include the analyses noted above as well as initial results based on the quasi-experimental design using data prior to P4HB (2009-2010) and post P4HB (2011-2013) for Medicaid births in comparison to privately insured women with an education level of high school or less. This comparison group is more like the Medicaid insured group in terms of income levels but would not have been affected by the implementation of P4HB. We note that all of this multivariate analysis is based on the time period during which Georgia's Department of Public Health (DPH) was the Title X grantee for the state. In July 2014, the Georgia Family Planning System (GFPS) became the new Title X grantee for the state. Given the concern that this change could have disrupted access to family planning services for P4HB and other Medicaid enrollees, the Emory evaluation team used the 2014 data available from DPH and GFPS to report on selected utilization measures for the first and second halves of 2014. The following are key findings:

## **Enrollment**

- Enrollment of eligible women into the FP only component of P4HB declined while the enrollment of women eligible for the IPC component grew through 2013 and stabilized in 2014;
- The percentage of women eligible for the FP only component of P4HB and ‘in need’ of services declined from 20% in 2013 to 9% in 2014;
- The percentage of women eligible for the IPC component of the demonstration remained fairly stable at approximately 18%.

## **Use of Family Planning Services**

- The use of any family planning service among Medicaid enrolled women ages 18-44 years peaked at 41% in 2011 then declined to approximately 34% in 2014;
- The use of Tier 1 (most effective) contraceptive methods by Medicaid enrolled women ages 18-44 years using some form of contraceptive was highest in 2011 at approximately 55% then declined slightly to 52% in 2014;
- The use of long-acting reversible contraceptives (LARCs) among Medicaid enrolled women declined over the 2009-2014 period but use among non-Medicaid women seeking services from Title X providers rose to 10% of ‘non-Medicaid Title X women using some form of contraceptive’ in 2013;

Based on the first six months of 2014 Title X data available from DPH, the percentage of ‘non-Medicaid Title X women using some form of contraceptive’ who were using LARCs was just below the 2013 level at 9.7%.

## Success with Outcomes

- Based on the quasi-experimental design, preliminary results indicate the P4HB program led to an increase in the age at first birth and a reduction in repeat births among women in the income and age range targeted by the Demonstration;
- The reduction in the probability of a repeat birth was strong among women ages 18-24 years, estimated at -3.02 percentage points;
- While the direction of the effects of the P4HB program on low birth weight and very low birth weight births was negative, these results were not statistically significant for the age group targeted by the Demonstration;
- Among participants in the P4HB program's FP only component, the cumulative percentage with evidence of pregnancy is lower by the 10<sup>th</sup> month of follow-up in comparison to a sample of RSM women with an index birth in the same year who did not participate in the P4HB program;
- By the 18<sup>th</sup> month of follow-up, the cumulative percentage of FP only women enrolling for years 2011-2013 with evidence of pregnancy was 15.5-16%, whereas for RSM non-participants, these percentages equaled 16.2 - 18%;
- A comparison of outcomes for IPC participants to a random sample of RSM women with a very low birth weight birth indicated that for the years 2011-2013, there were three (3) subsequent pregnancies ending in adverse outcomes for the IPC participants (2 LBW, 1 VLBW) versus six (6) adverse outcomes for the RSM random sample comparison group (3 LBW, 1 VLBW, 2 fetal deaths);
- For the 2012 cohort of IPC enrollees, the percentage (16.3%) having a new pregnancy within 18 months of their index delivery of a VLBW infant was significantly lower than

this percentage (33.3%) for RSM women with a VLBW infant in the same time period but not participating in the IPC component.

### **Threats to Success**

- The decline in the percentage of women eligible for the FP only component who are actually enrolling in the program;
- Since the Title X clinics receive Medicaid reimbursement for services provided to Medicaid clientele and serve as a point of access for P4HB enrollees the decline in users of any Title X services by 58% from the first to the second half of 2014 could be a concern;
- Similarly, the decline in the number of users of LARCs after a Title X visit by 74% may mean women who are likely eligible for the P4HB program are using the most effective methods at a much lower rate;
- Both uninsured and privately insured Title X users declined from the first to second half of 2014 indicating there may be a broad disruption in access for women in the income range eligible for the P4HB program;
- Changes in the income of Georgia's Title X users from the first to the second half of 2014 indicate a shift toward higher incomes (>250% FPL) and hence, suggest the decline in P4HB-enrolled women was not the result of them transitioning to the new Title X grantee for family planning services.

### **Overall Trends in Births and Costs**

- Births paid by Medicaid continued to grow in number and total costs from 2011 through 2013, but declined slightly between 2013 and 2014 to a total of 77,966;
- Low birth weight infants accounted for 6.5% of Medicaid births in 2014 and cost the state almost \$63 million;

- Very low birth weight infants accounted for 2.1% of Medicaid births in 2014 and cost the state almost \$122 million;
- The overall distribution of Medicaid births by birth weight indicated little change over the 2009 through 2014 period when measured by claims data. A reduction from 2.0% VLBW in 2009 to 1.9% VLBW in 2013, based on linked vital records, was observed;
- The first year of infant life costs for the VLBW infants continued to be high when counting the \$73,398 at delivery plus \$7,667 post delivery costs.

## **I. OVERVIEW OF THE PLANNING FOR HEALTHY BABIES PROGRAM (P4HB)**

In response to the persistent high rate of low birth weight (LBW) and very low birth weight (VLBW) infants born to women in Georgia, DCH designed a Section 1115(a) Demonstration, Planning for Healthy Babies<sup>®</sup> (P4HB<sup>®</sup>), and was granted authority by CMS to expand access to family planning services under the P4HB program. This program became available effective January 1, 2011 for women deemed eligible by meeting the following criteria: 1) U.S. citizens and residents of Georgia who are otherwise uninsured and not eligible for Medicaid; 2) 18 through 44 years of age; 3) not pregnant but able to become pregnant; and 3) with incomes at or below 200% of the Federal Poverty Level (FPL).

The P4HB program also provides Interpregnancy Care (IPC) services to women who meet the above eligibility criteria and who deliver a very low birth weight (VLBW) infant (<1500 grams or < 3 pounds 5 ounces) on or after January 1, 2011. The program also offers nurse case management and Resource Mother outreach services to women receiving IPC services and to women enrolled in the Georgia LIM (Low Income Medicaid) or ABD (Aged, Blind and Disabled) Medicaid

programs who deliver a very low birth weight infant on or after January 1, 2011. DCH identified the following as key outcome goals for the P4HB Demonstration:

- **Primary:** Reduce Georgia's LBW and VLBW rates;
- **Secondary:** Reduce the number of unintended pregnancies in Georgia;
- **Tertiary:** Reduce Georgia's Medicaid costs by reducing the number of unintended pregnancies by women who otherwise would be eligible for Medicaid pregnancy-related services.

### **Demonstration Objectives**

The primary goal of the Demonstration is to reduce Georgia's LBW and VLBW rates among Medicaid insured women. The following related objectives were identified to effect achievement of the goals of the Demonstration:

- Improve access to family planning services by extending eligibility for these services to the newly eligible women noted above during the length of the Demonstration.
- Provide access to interpregnancy primary care health services for eligible women who deliver a VLBW infant during the effective period of the Demonstration.
- Decrease unintended and high-risk pregnancies among Medicaid eligible women.
- Decrease late teen pregnancies by reducing the number of first or repeat teen births among Medicaid eligible women ages 18-19 years.
- Decrease the number of Medicaid-paid deliveries from the number expected to occur in the absence of the Demonstration beginning in the second year.
- Increase child spacing intervals through effective contraceptive use to foster reduced LBW rates and improved health status of women.

- Increase consistent use of contraceptive methods by providing wider access to family planning services and incorporating care coordination and patient-directed counseling into family planning visits.
- Increase family planning utilization among Medicaid eligible women by using an outreach and public awareness program designed with input from family planning patients and providers as well as women needing but not receiving services.
- Decrease Medicaid spending attributable to unintended births and LBW and VLBW babies.

These objectives point to several quantifiable performance measures that are being assessed pre- and post- implementation of the Demonstration. The evaluation of these outcomes uses a quasi-experimental design, where possible, to test for changes pre and post the Demonstration in the following performance measures:

- Total family planning visits per poor and near poor woman;
- Use of contraceptive services/supplies per poor and near poor woman;
- Use of interpregnancy care services (primary care and outreach) by women with a VLBW delivery;
- Average interpregnancy intervals for poor and near poor women;
- Average interpregnancy intervals for women with a VLBW delivery;
- Teen and repeat teen births for poor and near poor 18 and 19 year olds;
- Rate of LBW and VLBW deliveries among the Medicaid population with comparisons to the statewide rates for LBW and VLBW deliveries;

- Rate of LBW and VLBW deliveries<sup>1</sup> among poor and near poor women and among Medicaid enrolled women compared to other populations within the state;
- Rate of infant mortality among the Medicaid population with a comparison to the statewide rate for infant mortality;
- Rate of infant mortality<sup>2</sup> among poor and near poor women and among Medicaid enrolled women compared to other populations within the state.

The objectives of the evaluation are to test not only for changes in the performance measures pre and post P4HB but to assess whether there is evidence of a causal pathway through the expanded access to care that P4HB provides. In order for P4HB to achieve significant changes in these measures, sufficient numbers of eligible women must enroll such that there is an increase in the overall use of family planning services among low-income women and/or an increase in the consistent use of more effective contraceptive methods than would otherwise occur. This PY4 report contains the first set of the planned pre/post analyses for all births in the state and for births to Medicaid enrollees versus lower income privately insured women as a comparison group. The latter analysis is based only on those Medicaid births occurring during 2009-2013, as the research team was able to link these to vital records.

## **II. SUMMARY OF FOURTH YEAR ACTIVITIES**

### **Communication and Outreach**

During PY4, DCH and each of the participating CMOs increased awareness of the P4HB program and encouraged participation by both consumers and providers. DCH also met with staff of both

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<sup>1</sup> While we include assessment of the rate of very low birth weight deliveries as a performance measure, we note that our power to detect differences will be limited due to the smaller number of IPC participants, the relatively short time period of the Demonstration over which these downstream outcomes can be observed, and potentially low participation rates.

<sup>2</sup> While we include assessment of the rate of infant mortality as a performance measure, our power to detect differences in this outcome will be limited by its relatively low incidence and the issues noted above.

the former state Title X grantee (DPH) and the new state Title X grantee (GFPS) to discuss data sharing with the Emory University evaluation team. As mentioned above, the Title X program in Georgia shifted to GFPS, a network of federally qualified health centers and other providers, in July 2014. The communication and outreach efforts for PY 4 are summarized below.

### **DCH Supported Activities**

In PY4, DCH: 1) educated Medicaid enrolled providers about the P4HB program; 2) utilized consumer-based outreach; 3) communicated regularly with the DPH about requirements to provide P4HB information to all applicants for the Medicaid Right From the Start (RSM) program; 4) held meetings with former and new Title X staff to discuss data sharing; and 5) completed an annual evaluation. The DCH link for the P4HB program is: <http://dch.georgia.gov/planning-healthy-babies>.

1. **Educate Providers.** DCH maintained ongoing communication with the local public health departments' family planning providers regarding the P4HB program. DCH also worked with the evaluation team and the CMOs to refine and implement two rounds of provider surveys during PY4. The provider surveys focused on providers' knowledge and understanding of the P4HB program as well as potential barriers with the program. One provider survey was distributed in May 2014, and a second provider survey was distributed in November 2014. The May 2014 provider survey results were reported in the Q2 2014 P4HB report, and the November 2014 provider survey results were reported in the Q4 2014 report.
2. **Consumer-Based Outreach.** DCH continued to conduct consumer-based outreach during 2014. DCH staff conducted outreach to local churches in an effort to raise awareness of the P4HB program. In January 2014, DCH reinstated its "Letter P80," a letter sent to all Medicaid eligible women enrolled in Right from the Start Medicaid (RSM) during their eighth month of

pregnancy. This letter provides women with information regarding P4HB eligibility and enrollment as well as details about selecting a CMO. Furthermore, DCH reinforced the requirement with the local county health departments throughout the state of Georgia that they must provide P4HB information to women applying for presumptive eligibility in the Medicaid RSM program. Finally, although DCH no longer reports outreach conducted by its Medicaid RSM outreach staff in the P4HB quarterly reports, the RSM outreach staff continue to educate the public about all of the medical assistance plans available through DCH, including the P4HB program.

3. **Agency Collaborations:** During PY4, DCH presented the P4HB program to the state's federally qualified health centers (FQHCs) at the GFPS Family Planning Conference in October 2014. Several of Georgia's local county health departments provided family planning services and ramped up their efforts to assist women wishing to enroll in P4HB.

### **CMO Supported Activities**

Each of the three CMOs working with the P4HB program has their own client and provider education plans relative to the P4HB program. This information is posted on their respective websites. (<https://www.myamerigroup.com/GA/Pages/planning-for-healthy-babies.aspx>;

<http://georgia.wellcare.com/member/p4hb>;[http://www.pshpgeorgia.com/2011/02/18/planning-for-healthy-babies-program-p4hb-effective-january-1-2011/langswitch\\_lang/es/](http://www.pshpgeorgia.com/2011/02/18/planning-for-healthy-babies-program-p4hb-effective-january-1-2011/langswitch_lang/es/)).

During PY4, the CMOs continued the following client-related outreach efforts: welcome calls to newly enrolled P4HB members; home visits to IPC participants to conduct case management and to educate them on the IPC program; mailing of program materials (including contraceptive benefit information) to all new and existing P4HB members; distribution of a postcard to new members that emphasized the importance of utilizing contraception and reporting such use on the member

secure web portal; baby showers to expecting and new mothers that informed them about the P4HB program; on-site visits with high volume delivery hospitals and FQHCs to help educate women about the P4HB program and its IPC component in particular. The CMOs also took part in local and community education events to discuss the P4HB program with prospective clients.

### **Major Changes in the Year**

In January 2014, DCH reinstated the “Letter P80,” a letter sent to all Medicaid eligible women enrolled in the RSM pregnancy Medicaid program during their eighth month of pregnancy. This letter provided women with information about P4HB eligibility and enrollment as well as details about selecting a CMO. It was sent to all eligible recipients throughout the year. As reflected in the PY4 quarterly reports, these letters were among the most frequently cited ways that applicants learned about the P4HB program. In addition, DCH reinforced with the local public health departments throughout the state of Georgia that they must provide P4HB information to women applying for presumptive eligibility in the Medicaid RSM program. DCH is pleased with this effort, since health departments were listed in the PY4 quarterly reports as being among the most frequently cited ways that applicants learned about the P4HB program. The last major change occurred in July 2014 to the Title X program, when GFPS replaced DPH as the state’s Title X grantee. DCH met with GFPS staff several times to discuss the P4HB program and the sharing of Title X data with the P4HB evaluation team at Emory University.

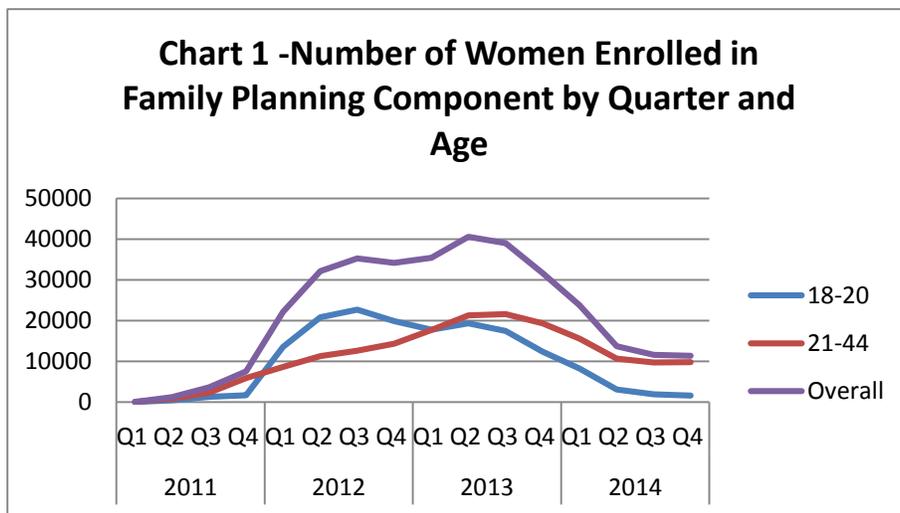
### **III. ENROLLMENT OF ELIGIBLE WOMEN**

The enrollment and retention of eligible women in the P4HB program is extremely important for achieving the goals described above. In our quarterly reports, we provide summaries of the P4HB enrollment process, barriers to enrollment, and enrollment patterns. As these data and reports have documented, the auto-enrollment of P4HB FP only enrollees significantly affected the numbers

and patterns of enrollment in the P4HB program, and the discontinuation of this policy in June 2013 contributed to declining enrollment in the FP only component of P4HB. We report below on trends in the number of women enrolled in the FP only and IPC components of the P4HB program through the most current data, December 2014.

**Enrollment Trends:** As

demonstrated in previous annual reports, the number of women enrolled in the P4HB program is lower than the number deemed eligible, but the gap has narrowed. By the end of



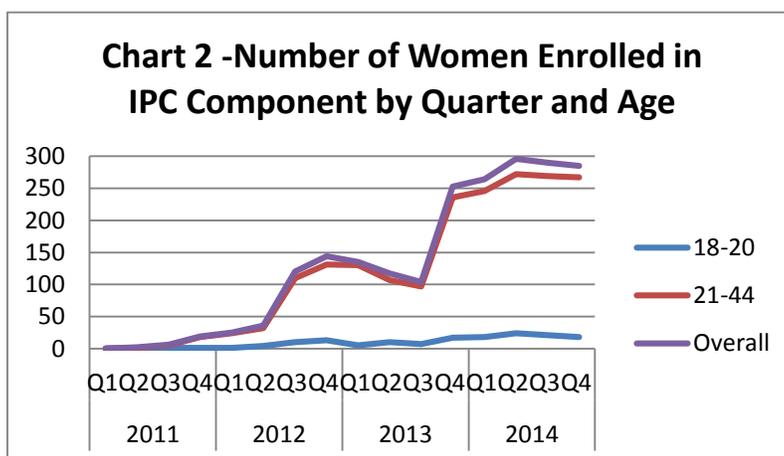
PY4, the number of women enrolled in one of the CMOs and eligible to receive FP only services was 11,370, or 90.2% of the 12,609 deemed eligible for this component as noted in our Quarter 4, PY4 report.

As shown in Chart 1, the patterns of enrollment indicate a marked decrease in enrollment for the 21-44 year old group from Q4 of 2013 through Q4 of 2014. P4HB enrollment among women in this age group dropped by nearly half (49.4%) from 19,287 in Q4 2013 to 9,767 in Q4 2014. Enrollment for the 18-20 age group, also continued to drop in 2014. Enrollment for this age group dropped by 87.1% from Q4 2013 to Q4 2014 (from 12,403 to only 1,603).

As previously noted, the gap between the number of women deemed eligible and the number actually enrolled in the FP component of P4HB narrowed from 2012 through 2014. By the end of 2014, the gap was 9.8% compared to 14.3% at the end of 2012. We are aware that the overall

increase in enrollment through Q2 of PY3 was driven in part by the auto-enrollment policy, and the end of auto-enrollment resulted in the large declines seen in the above graph. Using a list of study IDs for women auto-enrolled in the FP only component of P4HB at some point in 2013, it was identified that 67% were auto-enrolled into the program. We have seen in prior reports that these enrollees exhibit different care-seeking behaviors regarding the use of family planning services during their time enrolled, and we again provide some separate statistics for P4HB enrollees, based on whether they were auto-enrolled or not, in this annual report.

Nearly 81.4% of the P4HB participants deemed eligible for the IPC component were actually enrolled in a CMO by the end of 2014 (285 of 350 deemed eligible) as shown in Chart 2. Over 93% of the enrolled women were in the 21-44 age range and the overall growth in

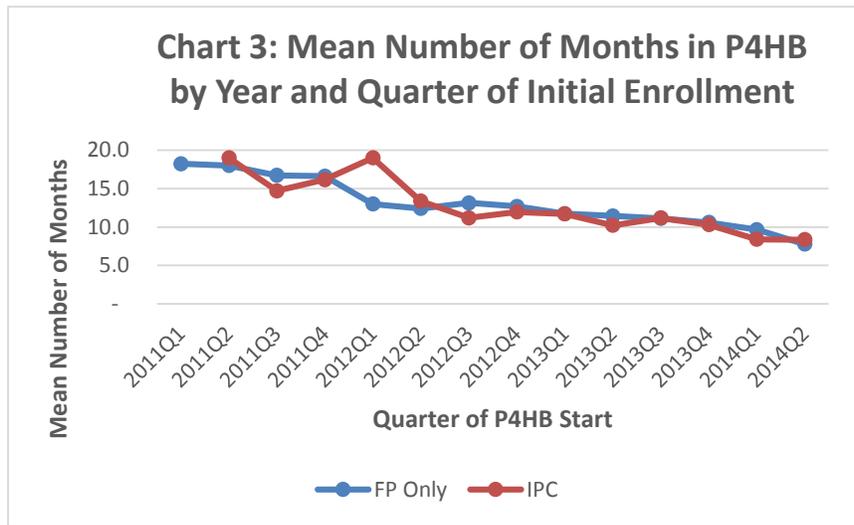


IPC enrollees was due to growth in this age group. While the overall enrollment in the IPC component declined during the first three quarters of 2013, it increased dramatically by the end of 2013. There were 104 women enrolled in IPC in Q3 2013 and 253 in Q4, an increase of 143%. During 2014, the increase in enrollment of women in IPC was not as dramatic as in 2013, but nonetheless there was an increase from 264 in Q1 2014 to 285 in Q4 2014 (8.0% increase). While the number of women enrolled in the 18-20 years old group essentially remained static during 2013, those in the 21-44 years old age group showed almost identical changes to the overall group. Some of this growth was likely due to auto-enrollment into the IPC component, which was instituted as of April 1, 2012.

The number of women enrolled in the Resource Mothers only component of the P4HB program totaled 32 by the end of PY4. Combined with the 285 women enrolled in the IPC component, there were 317 women who had delivered VLBW infants and received, through the P4HB program, nurse case management and Resource Mother services, primary care and other IPC services available to them, by the end of PY4.

**Duration of Enrollment:**

The data in Chart 3 shows the mean number of months enrolled for both the FP only and the IPC components of the Demonstration by the quarter in which the woman was first enrolled. As these



data show, women entering the P4HB program tended to remain enrolled for 10 months or longer with somewhat longer periods of enrollment for those initiating enrollment in 2011. This primarily reflects that we are able to observe their enrollment over a longer period than those enrolling later in the demonstration. For those enrolling initially in any quarter of 2012 or 2013, the number of months enrolled averaged 10 months or just above that for women in both the FP only and IPC components of P4HB. While there is a slight decline in this average for those enrolling in the first or second quarter of 2014, this is largely due to the shorter follow-up period over which we can observe their enrollment (through June 2015).

## **Participation Rates**

For the P4HB program to succeed as planned, the program must enroll a significant number of women in the community eligible for its benefits. As noted, the P4HB program targets women, ages 18-44 years with incomes at or below 200% FPL, who are not otherwise insured. As in our prior reports, we used data from the American Community Survey (ACS) for each year to estimate the number of uninsured women in this age and income range in order to gauge the percentage of eligible women enrolled. The estimate for 2014 is 232,718 women and it excludes women who were non-citizens and hence, not eligible for P4HB.

As shown below in Table 1, we estimated that the P4HB program enrolled less than 3% of the total number of women estimated to be eligible and in the community based on income, age and citizenship (296,949 from the ACS) in 2011. In 2012, it was estimated there were 285,927 uninsured women citizens in Georgia within the age and income group targeted by the P4HB program. This should have resulted in approximately 12% of this eligible population enrolled in the family planning only component of P4HB in PY 2 and 11% in PY3. In PY4, however, this percentage dropped to almost 5%, a marked decrease, based on the 2013 estimate of uninsured women from the ACS data. Given the role out of the ACA and the decline in uninsured in all states, it is likely this overstates the number of remaining uninsured women with incomes less than or equal to 200% FPL.

**Table 1. Enrollment of Population Eligible in the Community**

Demonstration Group	Enrolled in 4 <sup>th</sup> Quarter	Population Eligible in Community <sup>1,2</sup>	Percent Eligible Enrolled
FP Only 2011	7,543	296,949	2.5%
<b>2012 P4HB Enrollment/Participation</b>			
FP Only 2012 <sup>3</sup>	34,184	285,927	12.0%
FP Only 2012	34,184	155,830 <sup>4</sup>	21.9%
IPC/Resource Mother Only	221	1,522	14.5%
<b>2013 P4HB Enrollment/Participation</b>			
FP Only 2013 <sup>3</sup>	31,690	287,220	11.1%
FP Only 2013	31,690	156,535 <sup>4</sup>	20.2%
IPC/Resource Mother Only	318	1,716	18.5%
<b>2014 P4HB Enrollment/Participation</b>			
FP Only 2014 <sup>3</sup>	11,370	232,718	4.9%
FP Only 2014	11,370	126,831 <sup>4</sup>	9.0%
IPC/Resource Mother Only	317	1,616	19.6%

<sup>1</sup>Those eligible for family planning only benefits are uninsured female citizens ages 18-44 with income < 200% FPL and residing in Georgia. The number of uninsured women in this age and income range was estimated using the ACS 1-year PUMS for 2011 – 2014 as shown in column 3. <sup>2</sup>Those eligible for IPC include uninsured women 18-44 with income < 200% FPL residing in Georgia with a live born infant under 1500 grams at delivery. Women enrolled in RSM with a VLBW infant should be the denominator for this calculation. Those eligible for Resource Mother only include LIM and ABD Classes of Eligibility women with a VLBW infant. We combine the enrollment counts for IPC and Resource Mother for the numerator and use all Medicaid paid VLBW births in 2014 (n = 1,616 in Table A.1 shown later) as the denominator. <sup>3</sup>We use the numbers enrolled as of the 4<sup>th</sup> quarter of 2014 (and reported in our 4<sup>th</sup> Quarter 2014 Report) for consistency with the earlier parts of this report.

<sup>4</sup> This denominator adjusts for women in need of family planning services based on a report from the Guttmacher Institute. Their estimate is that 54.5% of women in the age group 13-44 were actually in need of family planning services; they count women who are sexually active, able to get pregnant but not currently pregnant or trying to get pregnant. See: <http://www.guttmacher.org/pubs/win/contraceptive-needs-2008.pdf>. We multiplied the “in the community” population by .545 to get the 155, 830 for 2012, 156,535 for 2013, and 126,831 for 2014 as shown in column 3.

When we consider that only an estimated 54.5% of the eligible population may be ‘in need’ of family planning services (sexually active, able to become pregnant, not currently pregnant or trying to get pregnant), the estimated percentage enrolled in PY2 and PY3 was around 20%. This dropped, however, to only 9% of the eligible group ‘in need’ of services in PY4. .

If these declines are due to enrollment of women into traditional Medicaid or subsidized insurance on the Marketplace, there is less concern for access to family planning services for them. We are not able, however, to document the causes for this decline. While a large number of women in need of family planning services could be served by the Title X program in Georgia, the switch to

a different grantee in June 2014 may have disrupted access patterns. We report on changes seen in this program pre and post the change in the grantee in a later section of this annual report.

In contrast to the FP only component of P4HB, the data in Table 1 show that the percentage of women with a VLBW infant who were enrolled in the IPC and Resource Mother only components of the program grew over the PY2 and PY3 years. Of the total births estimated to be in the VLBW category (see Table 1) in PY4, almost 20% of the mothers were enrolled which was a slight increase from PY3.

#### **IV. USE OF FAMILY PLANNING SERVICES**

For the P4HB program to meet its objectives, the program must enroll a sufficient number of eligible women in the community and ensure they have access to and utilize effective family planning services once they are enrolled. Moreover, the use of family planning services through the P4HB program should be in addition to those provided through other public programs, such as Title X, in order for the use of family planning services by all women of reproductive age in the income range targeted by the P4HB program to increase.

In our PY3 Annual Report, we indicated that the percentage of uninsured women in the income range targeted by the P4HB program (greater than 25% but less than or equal to 200% FPL) using any family planning services at Title X clinics increased slightly from the first quarter of 2009 through the last quarter of 2013. In addition, the use of contraceptives at Title X clinics shifted toward long-acting, reversible contraceptives (LARCs). While the use of family planning services among all Medicaid enrolled women ages 18-44 decreased from 2011 to 2013, the 2013 percentage (36.3%) was just above the 2009 percentage (35.2%). When viewed as a combined, publicly funded family planning delivery system, we noted in prior reports that total family planning

services (paid for by Medicaid or Title X) did not increase enough to result in a growing percentage of all women, with incomes at or below 200% FPL, in the community with a family planning or birth control visit from 2009 through 2013.

### **Family Planning and Birth Control Visits by Medicaid and Title X Clients**

In this section of the PY4 report we update the data on Medicaid utilization through 2014 using claims data and report on Title X usage for the first and second halves of calendar year 2014. Our ability to track the same Title X data and patterns through PY4 is limited by the change in the Title X grantee in July 2014; the new grantee is not able to provide the same granularity of data to the evaluation team. Even in the absence of this change, interpretation of utilization patterns at public clinics would be affected by the continued implementation of the ACA, which has increased Medicaid enrollment among those eligible under Georgia's existing income levels and increased insurance coverage through participation in the subsidized Marketplace for those between 100 % and 400% FPL in Georgia.<sup>i</sup> With the implementation of the ACA, some of the lower income clients served by Title X may have secured private insurance coverage and sought other providers and hence, may not be observed in the Title X data. Those newly enrolling in Medicaid may also have sought services at non-Title X providers but in this case, we would observe their service use in the Medicaid claims data.

The data in Table 2 shows the usage over the pre/post P4HB period and reflects the percentage of Medicaid enrolled women ages 18-44 years receiving any family planning visit paid by Medicaid and in turn, the percentage of visits/services (drug claims are included) for some form of birth control. We also report on the intensity of usage by including the number of family planning visits

per user. In prior years, we were able to report on visits paid by Title X for non-Medicaid enrolled women ages 18-44 years, as a percentage of all women  $\leq$  200% FPL in Georgia. Since this detail is not available from the new grantee, we provide Title X data through June 2014 only where possible.

It was anticipated that the implementation of the P4HB program would have increased the percentage of Medicaid women with any family planning visit and potentially, visits for contraception. As the data in Table 2 shows, the percentage with any family planning visit increased from approximately 35% in 2010 to almost 41% in 2011, but declined to 36% by 2013 and further declined to approximately 34% in 2014. The percentage of Medicaid enrolled women for whom the visit involved the provision of contraception declined over the pre/post period from nearly 12% in 2011 to 10% in 2014. The data continue to indicate, however, that Medicaid women who use some family planning services may be using these services more intensely as the mean number of visits per user increased from an average of 2.19 per year to 2.41 per year over the study period, although this seems to be following a downward trend from 2012-2014 as well.

**Table 2. Use of Family Planning and Birth Control Visits among Medicaid Enrolled, Title X Non-Medicaid Enrolled and Combined Usage, 2009-2014**

	Use Among Medicaid Women Ages 18-44/All Medicaid Enrolled			Use At Title X Clinics among non-Medicaid Enrolled Women Ages 18-44/All Women < 200%FPL			Total Use (Title X Non Medicaid Plus Medicaid)/All Women < 200% FPL	
	Any Family Planning Visit <sup>1</sup>	Mean Visits Per User	Any Visit /Service for Birth Control <sup>1</sup>	Any Family Planning Visit <sup>2</sup>	Mean Visits Per User	Any Visit /Service for Birth Control <sup>2</sup>	Any Family Planning Visit <sup>3</sup>	Any Visit /Service for Birth Control <sup>3</sup>
<b>2009</b>	35.2%	2.19	11.6%	13.3%	2.12	12.2%	33.7%	19.0%
<b>2010</b>	35.8%	2.27	10.8%	13.5%	2.09	12.3%	33.4%	18.3%
<b>2011</b>	41.1%	2.21	11.7%	12.8%	2.13	11.7%	32.6%	17.3%
<b>2012</b>	37.8%	2.46	11.6%	12.0%	2.17	11.0%	31.8%	17.1%
<b>2013</b>	36.3%	2.42	10.6%	10.4%	2.18	9.7%	29.8%	15.3%
<b>2014</b>	33.7%	2.41	10.0%	NA	NA	NA	NA	NA

<sup>1</sup> Denominator is all women ages 18-44 enrolled in Medicaid during year. <sup>2</sup> Denominator is all women ages 18-44, citizen, and < 200% FPL in Georgia during year. <sup>3</sup> Denominator is all women ages 18-44, citizen, and < 200% FPL in Georgia during year; numerator is sum of use among Medicaid enrolled women and Title X non-Medicaid enrolled women ages 18-44.

### **Types of Contraception Used**

Another way the introduction of P4HB into the combined Medicaid and Title X systems could affect usage of family planning services is to move women using some form of contraception toward one of the more effective methods. In Table 3 below, we show the distribution of the tiers of effectiveness of the contraceptive methods paid for by the Medicaid program and by the Title X program for non-Medicaid enrolled clients within the Title X system. We note that the latter data are based on only the first six months of calendar year 2014.

**Table 3. Distribution of Contraceptive Methods Paid By Medicaid and Title X, 2009-2014**

Year	% of Contraceptive Methods by Tier Paid by Medicaid: Medicaid Enrolled Women Ages 18-44				% of Contraceptive Methods by Tier Paid by Title X: non-Medicaid Insured Title X Users			
	Tier 1	Tier 2	Tier 3/4	LARC	Tier 1	Tier 2	Tier 3/4	LARC
2009	54.4%	42.3%	3.3%	38.4%	11.3%	71.8%	16.9%	5.8%
2010	51.9%	45.1%	3.0%	33.4%	11.2%	71.9%	16.9%	6.5%
2011	54.7%	42.2%	3.1%	36.0%	11.8%	70.8%	17.4%	8.0%
2012	53.2%	43.6%	3.3%	36.5%	11.9%	71.2%	16.9%	9.0%
2013	52.3%	43.5%	4.2%	35.2%	11.8%	72.3%	15.9%	10.1%
2014	52.3%	43.9%	3.8%	35.5%	10.9%*	77.5%*	11.5%*	9.7%*

Notes: WHO Tiers of contraceptive effectiveness: Tier 1(High effectiveness): implants, intrauterine devices, sterilization; Tier 2 (Medium effectiveness): injectable methods, patch, pills, and vaginal ring; Tier 3 and 4 (Low effectiveness): condoms, diaphragms, fertility awareness methods, spermicides; Long-acting reversible contraceptive methods (LARC) are a subset of Tier 1 methods that are reversible and include implants and intrauterine devices.

\* These percentages are based on 6 months of Title X data (1/1/14-6/30/14)

As these data show, the use of LARCs within the Medicaid program increased as a percentage of all methods used between 2010 and 2012. However, this percentage dropped slightly from 36.5% in 2012 to 35.5% in 2014. Use of LARCs at Title X clinics steadily increased from about 6% in 2009 to just over 10% of all users in 2013, but dropped slightly as a percentage of all users through the first six months of 2014 (9.7%). There was more of a shift from low effectiveness (Tier 3/4) to medium effectiveness (Tier 2) in these first six months while DPH was the Title X grantee.

If the P4HB program is working as intended, the patterns of family planning service and contraception usage among enrollees (with required months of continuous enrollment) should show increases as the P4HB enrollees become more aware of their benefits, more accustomed to their CMO providers and more of them receive advice regarding their reproductive health care. In Table 4, we have combined data for women in all components (FP only, IPC and RM) of the program but provided separate data for those who were auto-enrolled into P4HB versus those enrolling on their own in 2012-2014.

**Table 4. Use of Family Planning Services and Contraception among P4HB Demonstration (FP only, IPC, and RM) Participants, Auto-enrolled and Not Auto-Enrolled, 2011-2014**

Year		Service Utilization Among P4HB Women Ages 18-44 Years			Contraceptive Use Among P4HB Women Ages 18-44 by Method			
		Any Family Planning Visit <sup>1</sup>	Mean Visits Per Woman	Any Visit /Service for Contraception	Tier 1	Tier 2	Tier 3/4	LARC
2011	Overall	36.1%	1.79	11.0%	41.6%	48.0%	10.4%	35.3%
	Auto-enrolled	*	*	*	*	*	*	*
	Not Auto-Enrolled	36.1%	1.79	11.0%	41.6%	48.0%	10.4%	35.3%
2012	Overall	30.1%	1.98	8.8%	36.8%	53.0%	10.2%	31.9%
	Auto-enrolled	22.7%	1.86	6.2%	29.1%	59.4%	11.5%	27.9%
	Not Auto-Enrolled	43.9%	2.09	13.7%	43.2%	47.6%	9.1%	35.3%
2013	Overall	29.8%	2.0	8.5%	38.5%	48.8%	12.7%	33.6%
	Auto-enrolled	24.1%	1.95	6.7%	36.9%	51.5%	11.6%	32.9%
	Not Auto-Enrolled	43.6%	2.11	12.8%	40.6%	45.4%	14.1%	34.6%
2014	Overall	29.2%	2.06	8.4%	38.7%	49.5%	11.8%	31.5%
	Auto-enrolled	21.8%	1.98	6.1%	39.3%	51.2%	9.6%	30.4%
	Not Auto-Enrolled	39.9%	2.12	11.7%	38.3%	48.2%	13.5%	32.3%

<sup>1</sup>Denominator is all women enrolled in aid category codes 180-183 at least three months of continuous enrollment. \* < 5 family planning visits were found in the data for these women in 2011.

Notes: WHO Tiers of contraceptive effectiveness: Tier 1 (High effectiveness): implants, intrauterine devices, sterilization; Tier 2 (Medium effectiveness): injectable methods, patch, pills, and vaginal ring; Tier 3 and 4 (Low effectiveness): condoms, diaphragms, fertility awareness methods, spermicides; Long-acting reversible contraceptive methods (LARC) are a subset of Tier 1 methods that are reversible and include implants and intrauterine devices.

Overall, we see that the percentage of participants in the P4HB program who had any family planning visit remained stable at roughly 30% in 2012 through 2014, down from a high of 36% in 2011. We consistently see a high percentage receiving a family planning visit among P4HB women who were not auto enrolled versus those auto enrolled; roughly 44% versus 23-24% in 2012 and 2013. While this pattern holds in PY4, both groups show a decline in their receipt of a family planning visit; approximately 40% of those not auto-enrolled received any family planning visit in 2014 and approximately 12% of them had a visit which included a contraceptive method. The latter has declined from approximately 14% in 2012. The distribution of contraceptive methods by WHO tier of effectiveness among those using some form was comprised of 35% using LARCs in 2011 but this percentage dropped to 32% in 2014.

## **Role of ACA**

Before we consider the patterns of usage with the change in the Title X grantee, it is important to consider whether there were changes in users by income and insurance status while the prior grantee, DPH, was still providing Title X funded services. If there are changes in these patterns, they may be due to women in the income range eligible for subsidies on the Marketplace (in Georgia, from 100% to 400% FPL) obtaining a private qualified health plan that includes coverage of family planning and all other services, and hence, there is less concern with declines in users of Title X services. We would expect to see these declines in the early part of 2014 since open enrollment for the first year of subsidized premiums was from October 1, 2013, to March 31 of 2014; most of the shifts in insurance should be seen in these first two quarters. We therefore used the detailed data from the prior Title X grantee to measure the percentage change in users by income and insurance from the first two quarters of 2013 to the first two quarters of 2014 as shown below in Table 5.

**Table 5. Title X Data - Visits/Users by Insurance and Users by Income/Insurance**

	Q1 2013	Q1 2014	Q1 2013 v. Q1 2014		Q2 2013	Q2 2014	Q2 2013 v. Q2 2014	
	#	#	Difference	% Change	#	#	Difference	% Change
<b>Visits</b>								
Private	9751	8422	-1329	-13.6%	9415	7181	-2234	-23.7%
Public	11127	9102	-2025	-18.2%	10975	8541	-2434	-22.2%
Uninsured	41986	36768	-5218	-12.4%	41671	35125	-6546	-15.7%
Unknown	2922	2523	-399	-13.7%	2784	2442	-342	-12.3%
Total	65786	56815	-8971		64845	53289	-11556	
<b>Users</b>								
Private	7844	6963	-881	-11.2%	7579	6047	-1532	-20.2%
Public	9253	7597	-1656	-17.9%	9144	7168	-1976	-21.6%
Uninsured	34670	30742	-3928	-11.3%	34254	29210	-5044	-14.7%
Unknown	2361	2075	-286	-12.1%	2290	2063	-227	-9.9%
Total	54128	47377	-6751		53267	44488	-8779	
<b>Users (&lt;101% Federal Poverty Level)*</b>								
Private	6839	6008	-831	-12.2%	6588	5157	-1431	-21.7%
Public	8608	7212	-1396	-16.2%	8540	6780	-1760	-20.6%
Uninsured	30225	26967	-3258	-10.8%	29882	25706	-4176	-14.0%
Unknown	2153	1874	-279	-13.0%	2095	1866	-229	-10.9%
Total	47825	42061	-5764		47105	39509	-7596	
<b>Users (101% -400% Federal Poverty Level)*</b>								
Private	1005	955	-50	-5.0%	991	890	-101	-10.2%
Public	645	385	-260	-40.3%	604	388	-216	-35.8%
Uninsured	4445	3775	-670	-15.1%	4372	3504	-868	-19.9%
Unknown	208	201	-7	-3.4%	195	197	2	1.0%
Total	6303	5316	-987		6162	4979	-1183	

\*Federal Poverty Level, as determined by reported household income relation to Federal Poverty Guidelines published for 2014

The only clear pattern we expected to see in these data was a decline in the uninsured users as more women in the income ranges served by the DPH Title X program became either privately insured or Medicaid insured with the implementation of the ACA. As shown in the data in Table 5, there was an 11% to 15% decline in the number of uninsured users from 2013 to 2014 with a somewhat higher percentage decline in uninsured users in the income range above 100% FPL, the group most likely eligible for subsidized private insurance on the Marketplace. If the newly insured, whether private or Medicaid, used non-Title X providers, their usage of the Title X public

health clinics as sites for these services could also decline in the first two quarters of 2014. We also saw declines in the privately and Medicaid insured Title X users over the 2013-2014 time period, indicating they were shifting to non-Title X providers as they obtained insurance coverage. In the second quarter of 2014, the decline was roughly equal to 21% for both Medicaid and privately insured under 100% FPL but a greater decline was seen in the Medicaid insured above 100%, again, the group eligible for subsidized private insurance in Georgia.

### **Changes in Use with Change in Title X Grantee During 2014**

Due to the change in the data collection and reporting system of Georgia's new Title X grantee, the Family Planning Annual Report (FPAR) was the only source of uniform reporting by all Title X service grantees and it provided consistent, national level data on program users, service providers, utilization of family planning, and related preventive health services. Publicly available FPAR data reported by GFPS for the full calendar year of 2014 was used to gauge overall family planning utilization and, along with detailed data from DPH through July 2014, to estimate changes in Title X use pre/post the grantee change. The FPAR data are presented in summary form to protect the confidentiality of users and hence, we are able to combine the DPH and FPAR data for only a subset of the measures we previously analyzed.

In Table 6, the data on total utilization from the FPAR data is combined with aggregated data from DPH for the first six months of 2014 to derive an estimate of users per month by gender, income, and insurance. Among those using any method of contraception, we report the effectiveness of the method. We also report on the percentage of users less than 25 years of age who were tested for *Chlamydia trachomatis*, an established HEDIS quality measure since 2000. We derived measures of use for the first and second six month periods of 2014 by simply subtracting the counts for the first six months as reported by DPH (Column 2), from the total

reported in the FPAR (Column 1) and using this as the estimated usage in the last six months of 2014 (Column 3) under the GFPS, then displaying the difference in terms of number and percentage of users for each of the items of interest in the final column (Column 4). The monthly use rates were then derived by dividing the annual counts by 12 and part year counts by six.

**Table 6. Title X Users of Family Planning Services During 2014**

	FPAR Data -		Title X Data -		Title X Data		Difference in Measures in Title X Data	
	Reported for Jan - Dec 2014 <sup>1</sup>		Reported for Jan - Jun 2014 <sup>2</sup>		Extrapolated for Jul - Dec 2014 <sup>3</sup>		from Jan-Jun through Jul-Dec 2014 <sup>4</sup>	
	Annual	Monthly	Annual	Monthly	Annual	Monthly	Number	Percentage
<b>Number of Family Planning Users by Gender</b>								
No. Female	97,483	8,124	68,850	11,475	28,633	4,772	-6,703	-58%
No. Male	4,840	403	1,121	187	3,719	620	433	232%
Total	102,323	8,527	69,971	11,662	32,352	5,392	-6,270	-54%
<b>Number of Family Planning Users by Income in Relation to Federal Poverty Level (FPL)<sup>5</sup></b>								
<101% FPL	78,118	6,510	61,823	10,304	16,295	2,716	-7,588	-74%
101% to 250% FPL	12,646	1,054	7,830	1,305	4,816	803	-502	-38%
Over 250% FPL	1,100	92	318	53	782	130	77	146%
Unknown/Not reported	10,459	872	0	0	10,459	1,743	1,743	N/A
Total	102,323	8,527	69,971	11,662	32,352	5,392	-6,270	-54%
<b>Number of Family Planning Users by Insurance Coverage at the Time of the Visit</b>								
Private	14,973	1,248	9,924	1,654	5,049	842	-813	-49%
Public	22,393	1,866	11,305	1,884	11,088	1,848	-36	-2%
Uninsured	59,130	4,928	45,609	7,602	13,521	2,254	-5,348	-70%
Unknown/Not reported	5,827	486	3,133	522	2,694	449	-73	-14%
Total	102,323	8,527	69,971	11,662	32,352	5,392	-6,270	-54%
<b>Number of Female Family Planning Users by Effectiveness of Primary Contraceptive Method After the Visit</b>								
Tier 1, Non-reversible <sup>6</sup>	1,866	156	712	119	1,154	192	74	62%
Tier 1, Reversible (LARCs) <sup>7</sup>	6,770	564	5,364	894	1,406	234	-660	-74%
Tier 2 <sup>8</sup>	53,233	4,436	46,800	7,800	6,433	1,072	-6,728	-86%
Tier 3, 4 <sup>9</sup>	9,243	770	6,379	1,063	2,864	477	-586	-55%
Total	71,112	5,926	59,255	9,876	11,857	1,976	-7,900	-80%
<b>Number of Female Family Planning Users Less than 25 Years with Chlamydia Testing</b>								
No. tested	16,729	1,394	13,329	2,222	3,400	567	-1,655	-74%
No. not tested	25,025	2,085	19,497	3,250	5,528	921	-2,328	-72%
Total	41,754	3,480	32,826	5,471	8,928	1,488	-3,983	-73%

<sup>1</sup> Family Planning Annual Report (FPAR) data as reported by the Georgia Title X grantee

<sup>2</sup> Title X data as reported by the Georgia Department of Public Health (Title X grantee for Jan – Jun 2014)

<sup>3</sup> Title X data for Jul – Dec 2014 as extrapolated by comparing figures reported in FPAR and Title X data for Jan – Jun 2014

<sup>4</sup> Difference in the number and percentage of users seeking services between Jan – Jun 2014 and Jul – Dec 2014

<sup>5</sup> Federal Poverty Level, as determined by reported household income relation to Federal Poverty Guidelines published for 2014

<sup>6</sup> WHO Tiers of contraceptive effectiveness: Tier 1 (high effectiveness), non-reversible methods include sterilization by any method.

<sup>7</sup> WHO Tiers of contraceptive effectiveness: Tier 1 (high effectiveness), reversible methods include LARC methods, namely implants & intrauterine devices.

<sup>8</sup> WHO Tiers of contraceptive effectiveness: Tier 2 (medium effectiveness) methods include injectable methods, patch, pills, and vaginal ring.

<sup>9</sup> WHO Tiers of contraceptive effectiveness: Tier 3/4 (low effectiveness) methods include condoms, diaphragms, fertility awareness methods, & spermicides.

When comparing data from the first and second six-months of 2014, there were marked declines in the monthly number of female users of Title X services (-58%) and declines in both the uninsured (-70%) and privately insured (-49%) Title X users that exceed those seen in the prior table. The declines in numbers of users of contraception after their visits shown in Table 6 are larger in magnitude than the decline in users of any family planning services and indicate a decline in the use of highly effective, reversible birth control methods which include LARCs (-74%) along with larger declines in the use of birth control of medium effectiveness (-86%). Finally, among users of the GFPS that were under age 25, there was a marked decline in those receiving a test for chlamydia infection (-74%). Taken together, these data indicate that as the grantee, and hence the point of access for women seeking Title X services was altered, not only the number of users declined but the pattern of service use changed markedly.

The declines in users could be the result of women becoming privately insured through the federal exchange (with subsidies) and using a non-Title X provider or a higher percentage of women eligible for Medicaid taking up those benefits and again, using a non-Title X provider. Yet, the percent publicly insured did not markedly decline (-2%) from the first to the last six months of 2014, indicating a group of Medicaid insured women continued to use Title X clinics under the GFPS. We do not know if these Medicaid users are P4HB enrollees. However the decline in the percentage of users with income  $\leq$  250% FPL along with the increase in the percentage of users with incomes over 250% FPL between the first and second halves of 2014 is not consistent with P4HB enrollees (whose income is less than or equal to 200% FPL) moving toward the GFPS provider sites in this time period.

The change in the types of contraceptive methods used indicates a shift away from highly and medium effective, reversible methods to highly effective, permanent (+62%) methods (i.e., sterilization). The decline in the percentage of women Title X users, less than 25 years of age, with Chlamydia screening is of concern. We know of no reimbursement barrier to the provision of this service at the GFPS sites.

## **V. USE OF PRIMARY CARE AND PREVENTIVE SERVICES BY IPC WOMEN**

### **IPC Service Use**

A key goal of the IPC component of the P4HB program is to help these mothers maintain or improve their health by providing access to the expanded set of services noted earlier. The administrative data can be used to ascertain the types of conditions for which these women are seeking and receiving care under the P4HB program. Among the IPC component's participants, the claims data indicate that 158 of the 319 women (50%) enrolled in PY4 utilized services of any type; a similar percentage of women enrolled in IPC in PY3 utilized services of any type (118/254, 46%). The number of encounters for services by IPC component participants ranged from 1 to 30, with a mean of 2.0 encounters per IPC participant. Additionally, the claims data indicate that 43 of the 160 women (27%) enrolled in the Resource Mother only component of P4HB in PY4 utilized services, with the number of encounters ranging from 1 to 54 with a mean of 5.6 encounters per Resource Mother only participant. The ICD-9 diagnosis codes that appear in the claims data for these members are summarized below for the IPC and the Resource Mother only participants.

According to ICD-9 diagnostic codes within the Medicaid claims data, the use of services by women enrolled in the IPC component reflected the receipt of care for preventive services, acute gynecologic conditions or other gynecologic testing, dental conditions, other acute conditions,

contraceptive services, and chronic health conditions. Examples of preventive health care services received were routine well-woman examinations and routine medical check-ups (26), vaccinations (7), and other preventive screenings (5) and counseling (2). Among the most common services utilized were those for acute gynecologic conditions or gynecologic testing (92), including for sexually transmitted and vaginal infections (31), abnormal Pap smears and cervical dysplasia (14), as well as testing for sexually transmitted infections (9) and pregnancy (11). Services for care of non-gynecologic acute conditions (148) were the most commonly utilized services. Examples of common acute conditions for which care was sought included gastrointestinal tract infections and disorders (35), respiratory tract infections and disorders (24), musculoskeletal conditions (21), and urinary tract infections and disorders (20). Contraceptive and family planning services were utilized by 63 of the IPC enrolled women, and substance abuse counseling and treatment (not related to tobacco use) by seven (7) enrolled women.

Table 7 below summarizes the specific ICD-9 codes reflecting chronic health conditions that were present in the Medicaid claims data for IPC and Resource Mother only participants for PY4. For PY4, a similar percentage of members enrolled in the IPC component (45/319, 14%) and the Resource Mother only (20/160, 12.5%) had evidence of a chronic condition per the claims data. For members enrolled in either the IPC or the Resource Mother only component of the program, the most common chronic conditions for which members sought care were depression, hypertension, overweight and obesity, and tobacco use disorders.

**Table 7. ICD-9 Diagnostic Codes for Chronic Conditions for IPC and Resource Mother Only Participants**

Component of Program	Chronic Health Condition Evidence from Claims Data
Interpregnancy Care <sup>1</sup> (45 of 319 members with evidence of chronic condition) <sup>2</sup>	Hypertension (7 ) Depression/Anxiety (19) Obesity/Overweight (8) Migraine headache (6) Long-term medication monitoring (1) Thyroid disorder (1) Malaise/Fatigue (2) Tobacco Disorder (7) Asthma (5) Allergies (4) Hyperlipidemia (1) Anemia (4) Gastroesophageal reflux disease (2)
Resource Mother Only <sup>1</sup> (20 of 160 members with evidence of chronic condition) <sup>2</sup>	Hypertension (4 ) Depression/Anxiety (10) Obesity/Overweight (3) Migraine headache (3) Long-term medication monitoring (3) Tobacco Disorder (3) Asthma (1) Allergies (3) Anemia (2) Diabetes mellitus (1) Gastroesophageal reflux disease (2) Congestive heart failure (1)

<sup>1</sup>158 of the 319 IPC women and 43 of the 160 Resource Mother only had at least one Medicaid claim for service.

<sup>2</sup>Enrolled at least one month in 2014.

## VI. OUTCOMES AMONG P4HB PARTICIPANTS

***Averted Births.*** Compared to section 1115 Family Planning waivers in other states, the P4HB program has a budget neutrality requirement that is not based on averted births but rather on a ‘shifting’ of the birth weight distribution such that the total costs to the Medicaid program supported by the federal matching rate is lowered from what it would otherwise be by lowering the percentage of all Medicaid births that are LBW and VLBW. This shifting of the distribution should occur from the increased use of family planning services by those brought into the FP component of the P4HB program as well as from the management of contraceptive use and health conditions that affect reproductive outcomes among those women in the IPC and Resource Mother

only components of the P4HB program, which should help lengthen their interpregnancy intervals. Additionally, the treatment of acute and management of chronic conditions of women enrolled in the IPC component should lead to better health of the women, and in turn better birth outcomes.

While the count of ‘averted’ births is therefore not central to the calculation of budget neutrality on a quarterly or annual basis under the P4HB program, it is a metric that can be used to gauge the success of the program. In table 8 below, we present an estimate of the number of births that the state would have ‘expected’ to see among participants in the family planning only component of the P4HB program. The expected birth count is based on the fertility rate in the Planning for Healthy Babies’ Concept Paper submitted to CMS during the initial application process.<sup>3</sup> The fertility rate among women 18-44 years of age, with incomes at or below 200% FPL and uninsured in the fourth year of the P4HB program was estimated at 162 per 1,000. If this expected fertility rate is applied to all women enrolled in the family planning only and other program components at the end of PY3 (32,008 from Table 1) and hence, at risk of a delivery in PY4, the number of expected births is 5,185 in PY4 as shown below.

**Table 8 An Estimate of Averted Births among the P4HB Demonstration Population**

Number of ‘Expected’ Births Among Participants <sup>1</sup>	Number of Deliveries/Live Births in 2014 to Participants <sup>2</sup>	Number of ‘Averted’ Births
5,185	1,892	3,293

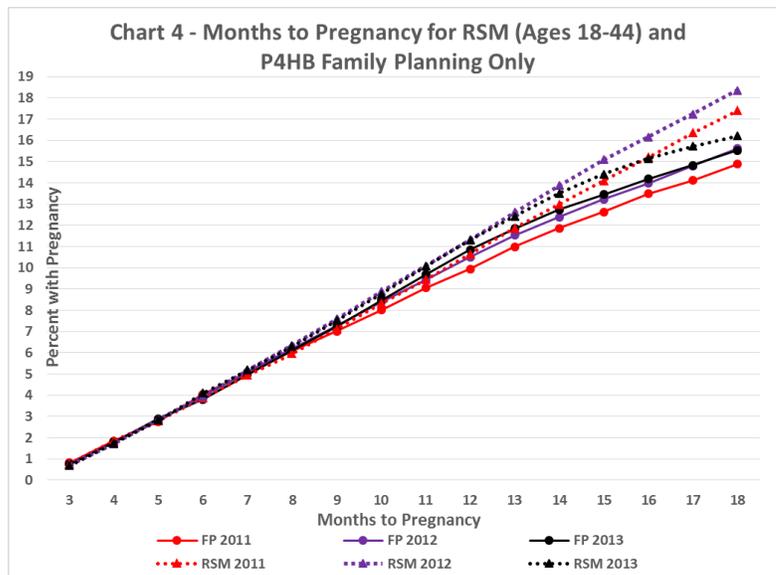
<sup>1</sup>Based on fertility rates from the concept paper developed in application process: [http://dch.georgia.gov/sites/dch.georgia.gov/files/imported/vgn/images/portal/cit\\_1210/33/52/156793595PlanningforHealthyBabiesProgram121709Final.pdf](http://dch.georgia.gov/sites/dch.georgia.gov/files/imported/vgn/images/portal/cit_1210/33/52/156793595PlanningforHealthyBabiesProgram121709Final.pdf)<sup>2</sup>Reflects the count of all deliveries of a live born in all three components in 2014 for women enrolled in Demonstration at the end of 2013, but includes only those counted based on the methods described in prior reports. If stillbirth and fetal deaths to women in all three components of the program are counted the total in 2014, would be 2,205.

The above estimates indicate that the number of actual births in PY4 to P4HB participants (1,892) enrolled at the end of 2013 is less than that expected and the number of ‘averted births’ is 3,293.

<sup>3</sup> Department of Community Health (DCH). (2011) Planning for Healthy Babies Concept Paper. Available at: [http://dch.georgia.gov/sites/dch.georgia.gov/files/imported/vgn/images/portal/cit\\_1210/33/52/156793595PlanningforHealthyBabiesProgram121709Final.pdf](http://dch.georgia.gov/sites/dch.georgia.gov/files/imported/vgn/images/portal/cit_1210/33/52/156793595PlanningforHealthyBabiesProgram121709Final.pdf)

The actual births counted here include births to P4HB enrollees that could be due to a pregnancy after the first 18 months of their enrollment in P4HB. This would be a pregnancy within an appropriate interpregnancy interval and means the number of ‘averted’ births could be undercounted in the above calculations. The positive number of averted births in Table 8 indicate potential savings to the state from a lower-than-expected birth rate among those enrolled in the P4HB program as of the end of 2013. We noted in earlier reports that the P4HB program compared well to that of other states with family planning waivers (Bronstein, Adams and Edwards, 2003)<sup>4</sup> in that states reported that births to participants ranged from a low of 11% (AR, SC) of the ‘expected’ number of births to as high as 80% (NM). In PY4, the 1,892 births among P4HB Demonstration participants constituted about 36% of the number ‘expected’.

**Family Planning Only Participants versus Non-Participants.** In this annual report, we continue to examine the outcomes of pregnancy or delivery among P4HB women after they enroll in the program. Now that more data are available for the post P4HB period, we have organized the data in this section by annual cohorts representing the woman’s initial enrollment into the P4HB program. This approach allows us to follow women from their initiation to a

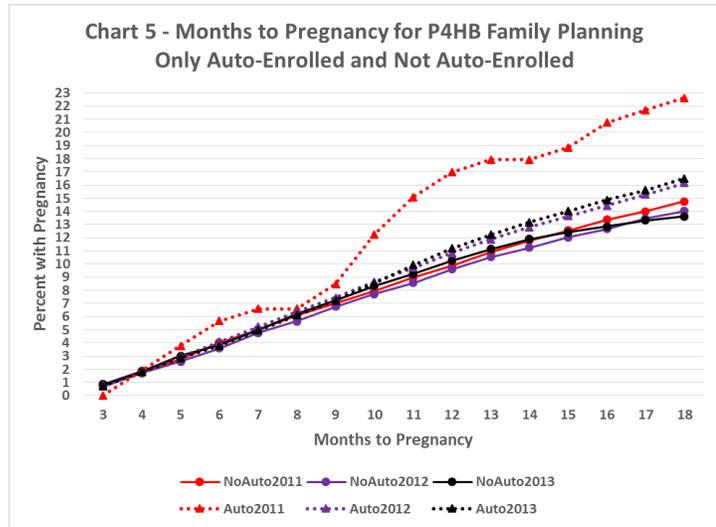


given outcome (new pregnancy) as shown in Chart 4. This chart shows the cumulative percentage

<sup>4</sup> See Bronstein, J, Adams EK and J Edwards. Evaluation of Medicaid Family Planning Demonstrations. Final Report under CMS Contract # 752-2-415921 completed by CNA Analysis and Solutions, Alexandria, VA, November, 2003.

of women enrolled in the FP only component of P4HB with evidence of a new pregnancy while enrolled in Medicaid. For the RSM women, this is a new pregnancy following an index birth in each year analyzed. We chart the data for the 2011, 2012 and 2013 cohorts of P4HB FP only enrollees and for comparison, we chart the same outcome for RSM women with an index birth in 2011-2013 who were never enrolled in the P4HB program. From the data shown in the chart, it appears that the percentage of women with new pregnancies starts to diverge for these groups in the 10-12 month period following enrollment in the P4HB program or the index delivery for RSM women, with a smaller percentage of P4HB enrollees with a pregnancy compared to RSM women. By the eighteenth month following their initial month of enrollment (in 2011) into the FP only component of P4HB, almost 15% of enrollees had evidence of a new pregnancy. This compares to 17% of RSM women who qualified for, but did not enroll in, P4HB who had a new pregnancy following their index delivery. These data suggests that P4HB has had some success in delaying a new pregnancy among eligible and participating women compared to women in the same income range, eligible for P4HB, but not participating. This differential exists in the 2012 cohort as well. Among 2012 FP only participants in P4HB, the percentage with a new pregnancy was almost 16% by 18 months while among the RSM women this percentage was 18%. For the 2013 cohorts, the differential narrows and the percentage with a new pregnancy within 18 months is quite close for the P4HB participants (15.5%) compared to the RSM 2013 cohort (16.2%).

In earlier reports we noted the differences in the care-seeking behaviors of the auto-enrolled and non-auto-enrolled women. We again show in Chart 5, the cumulative percentage of FP only enrolled women with a pregnancy by month since enrollment plotted separately for the auto and non-



auto enrolled. As these data show, the first cohort of women auto-enrolled were far more likely to have a new pregnancy within ten months, and by the eighteenth month almost one-quarter were pregnant. This cohort was small in number and, as noted before, less likely to make use of the family planning services in P4HB. For the 2012 and 2013 cohorts, the percent pregnant by the eighteenth month among auto-enrollees is higher than the percentage for those not auto-enrolled, and the 2012-2013 cohorts exhibit a cumulative percentage pregnant of approximately 14%; this is slightly below the percentage shown for all P4HB enrollees in the prior chart.

***IPC Participants versus Non-Participants.***

We can also consider the effect of the P4HB program on the IPC participants versus those eligible but not participating. For this analysis, we used a similar size random sample of RSM women with an index delivery/birth that was of very low birth weight in 2011-2013 to compare to the IPC women enrolling in 2011-2013 (PY1-PY3). While the number of total IPC enrollees was still small in PY2 and PY3, the data indicated that a smaller percentage (4.1-4.2%) experienced a repeat pregnancy within 6 months after enrollment in P4HB than the RSM women (9.8-5.0%) after an index very low birth weight birth in these same years.

A pregnancy conceived within 18 months of enrollment, regardless of outcome, is indicative of a short interpregnancy interval and is an adverse outcome that the P4HB program was designed to prevent. For the 2012 (PY2) cohort of enrollees in the IPC component, there was a lower percentage of repeat pregnancies within 12 (10.6% vs. 25.2%) and 18 months (16.3% vs. 33.3%) than the random sample RSM comparison group. We note that we can only observe pregnancies while women are enrolled in Medicaid. Many factors (employment or marital status that changes income and/or insurance coverage) affect whether the RSM women remained in Medicaid coverage for their next pregnancy or delivery. This consideration may affect the percentages we saw with a new pregnancy paid by Medicaid within 12 months of enrollment in the IPC component following their index delivery/birth. The IPC women are eligible for Medicaid during this interpregnancy period while RSM women may or may not be eligible for non P4HB Medicaid before a new pregnancy within 12 months of delivery. We also saw lower percentages of IPC participating women with a Medicaid paid delivery within 12 months for PY2 (2.4% versus 7.3%).

A key goal of the P4HB program is to reduce the repeat VLBW births among women with an index delivery with this outcome. In Table 9 we also report on the subsequent birth outcomes for the three cohorts of IPC participants and the random sample of RSM women with a VLBW infant in the same time period as the IPC women. For each year, the table shows the percentage of women enrolled in IPC or in the random sample of RSM women who became pregnant within 6, 12, or 18 months of the index VLBW delivery. We use the same follow-up time periods for the IPC and RSM women in order to make a clear comparison between the groups.

**Table 9. Number and Percent of Women with VLBW Infant with Repeat Pregnancy and Deliveries within Six or Twelve Months, IPC Waiver Demonstration Participants and Non-Participants**

	Year Enrolled / Index Birth	N Enrolled	n (%) Pregnant 6 Months	n (%) Pregnant 12 Months	n (%) Pregnant 18 Months <sup>1, 2, #</sup>	n (%) Delivery 12 Months <sup>3</sup>	Delivery Outcomes <sup>4</sup>
<b>IPC</b>	2011	16	1 (6.3%)	1 (6.3%)	2 (12.5%)	0	
	2012	123	5 (4.1%)	13 (10.6%)	20 (16.3%)	3 (2.4%)	1 LBW, 2 Norm
	2013	119	5 (4.2%)	15 (12.6%)	24 (20.2%)	5 (4.2%)	1 VLBW, 1 LBW, 2 Norm, 1 Unknown
<b>RSM Random Sample</b>	2011	16	0	1 (6.3%)	3 (18.8%)		
	2012	123	12 (9.8%)	31 (25.2%)	41 (33.3%)	9 (7.3%)	2 LBW, 4 Norm, 2 Fetal Death, 1 Unknown
	2013	119	6 (5.0%)	19 (16.0%)	26 (21.9%)	6 (5.0%)	1 VLBW, 1 LBW, 3 Norm

<sup>1</sup>Pregnancy within 6 months, 12 months or 18 months after date of enrollment in P4HB IPC. <sup>2</sup>Pregnancy within 6 months, 12 months or 18 months after date of index delivery of VLBW under RSM program. <sup>3</sup>Delivery within 12 months after date of enrollment in P4HB IPC or 12 months after date of index delivery of VLBW under RSM program. <sup>4</sup>Unknown delivery outcome due to inability to link mother delivery to newborn in Medicaid data.

<sup>#</sup>We use Chi-square test for all post P4HB years and by year to test for significant differences in the percentage pregnant within 18 months.

Where the samples are too small we use a Fisher's Exact test. Overall, IPC vs RSM is significant. IPS vs RSM is significant for 2012 using Chi-square test.

Notes: Repeat pregnancies were identified using the following set of claims codes: Repeat deliveries were defined as human conceptions ending in live birth, stillbirth (>= 22 weeks gestation), or fetal death (< 22 weeks). Ectopic and molar pregnancies and induced terminations of pregnancy were NOT included.

- **Deliveries of Live births** were identified in the claims by using: ICD-9 diagnostic codes 640-676 plus V27.x **OR** ICD-9 procedure codes 72, 73, or 74 plus V27.x **OR** CPT-4 codes 59400, 59409, 59410, 59514, 59515, 59612, 59614, 59620, 59622 plus V27.x
- **Deliveries of Stillbirths** were identified by using ICD-9 code 656.4x (intrauterine fetal death >= 22 weeks gestation) **OR** specific V-codes [V27.1 (delivery singleton stillborn, V27.3 (delivery twins, 1 stillborn), V27.4 (delivery twins, 2 stillborn), V27.6 (delivery multiples, some stillborn), V27.7 (delivery multiples, all stillborn)].
- **Deliveries associated with Fetal deaths < 22 weeks** were identified by using ICD-9 codes 632 (missed abortion) and 634.xx (spontaneous abortion).
- In the case of a twin or multiple gestations, the delivery was counted as a live birth delivery if ANY of the fetuses lived. Costs were accumulated over the pregnancy and attributed to the delivery event if there was a fetal death (632) that preceded a live birth.

We used Chi-square test (or Fisher's exact where the sample size was too small as in 2011) to compare the proportion of women in each group who became pregnant within 6, 12, or 18 months for each annual cohort of enrollees. For both the 2011 and 2013 cohort of IPC enrollees, there was not a significant difference for IPC versus RSM women in the percentage who became pregnant within the 6, 12 or 18 months intervals although the percentages are generally lower for the IPC participants. However, for the 2012 cohort of IPC enrollees, the difference in the percentage of IPC women versus RSM women who became pregnant within 12 or 18 months was statistically significant using Chi-square tests (p=.003 and p=.002, respectively). Given the small numbers in each year, we pooled all three cohorts (2011-2013) and found significantly lower percentage

pregnancies for IPC versus non-participating RSM women in the 12 ( $p = .01$ ) and 18 month ( $p = .01$ ) follow-up periods.

If we again consider the full post P4HB period (2011-2013), a comparison of the IPC and random RSM group in terms of the total number of adverse pregnancy outcomes (stillbirth or fetal death as well as any LBW or VLBW infants) observed for all pregnancies delivered through 2014, we see three adverse outcomes for the IPC group versus six adverse pregnancy outcomes for the RSM group. Both groups had births with unknown birth weight as observed in claims data where the mother and baby could not be linked.

## **VII. EFFECTS OF THE P4HB PROGRAM ON OUTCOMES 2009-2013**

As the P4HB program was being initiated in 2011, the Emory team proposed to work with the state in the evaluation of the P4HB program by obtaining and linking data to enable the state to assess changes in the performance measures noted earlier. The state hypothesized that the P4HB program would bring sufficient numbers of women into the program so as to increase the overall use of family planning services/supplies among low-income women and promote more consistent use of effective contraceptive methods among program users. Because the P4HB program is targeted at the income range of women who would qualify for Medicaid 'if' they become pregnant, we hypothesized that this increased use of contraceptives should lead to reduced unintended pregnancies and in turn, unintended births among the RSM eligible group of women in Georgia (as well as improved inter-pregnancy intervals). Since teens are at high risk of unintended pregnancy, a related hypothesis was that the rate of unintended births and repeat teen births would also fall post the Demonstration. An overall improvement in the use of family planning services and the outcomes noted could also occur among all Medicaid women if there were 'spillover'

effects on the LIM and disabled women in Medicaid and perhaps, to younger teens (<18 years) in Medicaid.

To assess the effects of the P4HB program, we first looked at the descriptive data on the outcomes for 2009 and 2013 for the RSM women and for a comparison group of women delivering a live birth in Georgia over the study period. The comparison group should be women whose coverage of family planning services was not likely affected by P4HB, and in the analysis that follows we used private insured women with a high school or less education level; we chose the lower education level in order to compare women with lower incomes to the RSM women, all of whom have incomes less than or equal to 200% FPL. We note that in future analyses we will test models using other comparison groups and methods to control for income differences between the groups.

***Changes in Birthweight, Teen Birth, Repeat Birth, and Interpregnancy Intervals.***

We are now at a point where we can use data from 2009 through 2013 linked to vital records to examine changes in: 1) age at first birth; 2) teen births; 3) repeat births; 4) maternal smoking; 5) interpregnancy intervals; 6) preterm births; and 7) birth weight distribution, as shown in Table 10. These descriptive data indicated that between 2009 and 2013, some of the outcomes of interest improved favorably for the RSM eligible women versus the private insured, lower educated group of women. For example, age at first birth, while higher for the private insured comparison group, was stable for this group from 2009-2013 while it increased slightly for the RSM eligible women. The increase in age at first birth for the RSM eligible group appears related to a decrease in teen births among this group. While the percentage of teen births was much lower for private insured than RSM eligible women in both 2009 and 2013, this percentage increased slightly from 2009 to 2013 for the private insured while for the RSM women, it declined from 14% to 10% over this period.

## Overall Patterns

**Table 10. Maternal Health and Birth Outcomes for RSM and Private Insured Women 2009, 2013**

Data for RSM and Private Insured Comparison Group on Targeted Maternal Health and Birth Outcomes, * All Live Births				
	Private Insured < High School		RSM Eligible Women	
	2009	2013	2009	2013
<b>Maternal Health Outcomes</b>				
Age at First Birth <sup>1</sup>	26.7	26.7	22.6	23.2
Age 18-19 at First Birth <sup>1</sup>	6.7%	8.8%	26.8%	20.4%
Teen Birth <sup>2</sup>	2.9%	3.6%	14.2%	10.1%
Repeat Birth <sup>3</sup>	65.1%	67.0%	58.7%	59.8%
Maternal Smoking <sup>4</sup>	5.1%	4.2%	10.8%	9.0%
Interpregnancy Interval ≤6months <sup>5</sup>	6.1%	5.6%	12.7%	10.1%
<b>Birth Outcomes (Live born infants)</b>				
Preterm (<37 weeks) <sup>6</sup>	10.6%	11.3%	11.5%	12.1%
Low Birth Weight (< 2500 grams) <sup>7</sup>	7.4%	7.5%	9.2%	8.9%
Very Low Birth Weight (< 1500 grams) <sup>8</sup>	1.4%	1.5%	1.5%	1.1%

\*All outcomes are measured using linked Medicaid and vital records data. <sup>1</sup>Age at first birth was determined based upon age and parity (parity = 0) as reported on the birth certificate; <sup>2</sup> Teen birth was defined as those ages 18-19 years at the time of the index birth as reported on the birth certificate; <sup>3</sup> Repeat birth was defined as those for which the birth certificate indicated that the birth event was the second or more (MBTHEVOR ≥ 2); <sup>4</sup> Maternal smoking was defined as those with tobacco use indicated on the birth certificate; <sup>5</sup> Interpregnancy interval ≤ 6 months was determined based upon the interbirth interval as indicated on the birth certificate minus the gestational age of the subsequent birth; <sup>6</sup> Preterm birth was determined based upon a gestational age < 37 weeks on the birth certificate; <sup>7</sup> Low birth weight was determined based upon an infant birth weight < 2500 grams on the birth certificate; <sup>8</sup> Very low birth weight was determined based upon an infant birth weight < 1500 grams on the birth certificate.

There were declines in maternal smoking and very short interpregnancy intervals for both groups but here too, the declines for RSM women were somewhat larger than for the private insured comparison group. The declines pre and post P4HB seen in maternal risk factors for RSM women that are associated with poor birth outcomes (teen pregnancy, smoking, short interpregnancy intervals) are consistent with the data showing the percentage of low birth weight and very low birth weight declining among RSM births albeit, by small amounts. There was no improvement, however, in the percentage born preterm for either RSM or the comparison group of privately insured women.

While we may have observed some of the hypothesized changes from simply looking at the aggregate data pre and post the Demonstration, it is possible that changes in the overall distribution of income, levels of employment, etc. will lead to changes in the numbers of women in need of and qualifying for Medicaid paid services. In order to control for some of these secular changes that may affect the fertility and birth outcomes of both the RSM and comparison group of women,

we used data pre and post the Demonstration and multivariate analysis to test whether there were differences in the changes seen pre and post the Demonstration for the two groups. Such a quasi-experimental design enables a more rigorous examination of the causal impacts of the Demonstration.

### ***Regression Analysis of RSM Compared to Sample of Private Insured***

As proposed in our evaluation design, we tested for effects of the P4HB program by analyzing changes in the above maternal and infant outcomes pre and post the P4HB implementation [first quarter of 2012] for the targeted group [women in the RSM eligibility income range and ages 18-44 years] over the pre/post P4HB period relative to the control group [private insured, low education levels]. Specifically, we used a pre/post (0/1) indicator, an RSM/private insured indicator (0/1) and interacted these two indicators (pre/post multiplied by RSM/private insured) to test for differences in the changes pre and post P4HB. We controlled for other factors [age, race/ethnicity, marital status, mother's education, mother tobacco use, month of birth] in all equations. First birth (0/1) was included when analyzing the infant outcomes. The results shown in Table 11 can be interpreted as the change in the probability of the outcomes [with the exception of age at first birth which is a continuous measure] for the targeted (RSM) versus control group (private insured) of women, controlling for the above covariates and a monthly time trend. This provides one measure of the 'effect' of the demonstration on the outcomes analyzed.

**Table 11. Estimated Effects of P4HB Implementation on Targeted Maternal Health and Birth Outcomes ,\* All Live Births**

	<b>Ages 18-44</b>	<b>Ages 18-19</b>	<b>Ages 18-24</b>
<b>Maternal Health Outcomes</b>			
Age at First Birth <sup>1</sup>	.45 <sup>^^</sup>	--	--
Age 18-19 at First Birth <sup>1</sup>	0.85	--	--
Teen Birth <sup>2</sup>	0.317	--	--
Repeat Birth <sup>3</sup>	-2.20 <sup>^^</sup>	-2.775	-3.02 <sup>^^</sup>
MaternalSmoking <sup>4</sup>	-0.325 <sup>^</sup>	-0.009	-0.548
Interpregnancy Interval ≤6months <sup>5</sup>	-0.775	5.385	0.330
<b>Birth Outcomes (Live born infants)</b>			
Preterm (<37 weeks) <sup>6</sup>	-0.119	-1.259	0.327
Low Birth Weight (< 2500 grams) <sup>7</sup>	0.129	-0.023	0.856
Very Low Birth Weight (< 1500 grams) <sup>8</sup>	-0.149	-0.794	0.175

<sup>^</sup> P-value < 0.10, <sup>^^</sup> P-value < 0.05, <sup>^^^</sup> P-value <0.01

(With the exception of age at first birth, estimated effects from logistic models are multiplied by 100 to provide percentage point changes in the dependent variable.)\*All outcomes are measured using linked Medicaid and vital records data. ◊ Insufficient sample size in control group.<sup>1</sup>Age at first birth was determined based upon age and parity (parity = 0) as reported on the birth certificate; <sup>2</sup> Teen birth was defined as those ages 18-19 years at the time of the index birth as reported on the birth certificate; <sup>3</sup> Repeat birth was defined as those for which the birth certificate indicated that the birth event was the second or more (MBTHEVOR ≥ 2); <sup>4</sup> Maternal smoking was defined as those with tobacco use indicated on the birth certificate; <sup>5</sup> Interpregnancy interval ≤ 6 months was determined based upon the inter-birth interval as indicated on the birth certificate minus the gestational age of the subsequent birth; <sup>6</sup> Preterm birth was determined based upon a gestational age < 37 weeks on the birth certificate; <sup>7</sup> Low birth weight was determined based upon an infant birth weight < 2500 grams on the birth certificate; <sup>8</sup> Very low birth weight was determined based upon an infant birth weight < 1500 grams on the birth certificate.

While these results should be seen as preliminary, overall, we did find a few significant effects of the P4HB program on the outcomes of interest using the 2012 and 2013 as the post P4HB study period. The direction of the effects was largely in the expected direction and indicated some improvements related to the implementation of P4HB. The significant effects were on: 1) increasing the age at first birth and 2) reducing second birth in the post versus pre P4HB period for women in the age group targeted by the Demonstration (18-44 years) and specifically, among women ages 18-24 years.

The result on age at first birth suggests about a half year increase in the age at which women targeted by the P4HB program have their first birth relative to the privately insured control group. The results on repeat births indicate that women targeted by the Demonstration were less likely to have another birth compared to the privately insured control group and this reduction was in the range of 2.2-3.0 percentage points where significant. While we did not find a significant effect on repeat births specifically for the teen groups, the marginal effects were in the expected negative

direction. The lack of significance could be affected by smaller sample sizes in our control group of private insured teens with live births. As we continue the analysis, we will seek to develop other control groups and/or consider ways to increase the sample size of this group.

While the direction of the effects on infants born preterm and of very low birth weight is negative as expected in most of the equations, there are no statistically significant results for the group made newly eligible for family planning services (RSM, ages 18-44 years) by the Demonstration. We also found a reduction in the rate of maternal smoking, but we note that the state of Georgia implemented a change in reimbursement for Medicaid smoking cessation services for pregnant women required by the ACA in January 2012 which coincides with the post P4HB period; hence, the effect of this policy on smoking is likely entangled with the effects of the P4HB program. We controlled for maternal smoking in our equations and found no difference in the results when this variable was excluded.

#### **VIII. MEDICAID PAID BIRTHS 2014**

We continue to track the total number of Medicaid paid births and births to participants as in prior annual reports to CMS. We placed these large summary tables for 2014 in Appendix A in order to focus on other components of the evaluation in this report. As noted in the Appendix tables (Table A.1), the number of Medicaid paid births declined from 85,370 in 2009 to 81,463 in 2010 and to a low of 75,087 in the first year (2011) of the P4HB program; we note that declines were also seen in national data possibly due to the financial conditions imposed on families during the recession. Birth counts increased from the 2011 level to 79,589 in 2012 and to 78,681 in 2013. There was a slight decline in the number of total births paid by Medicaid in 2014 in which the total is reported as 77,966.

As the data in Table A.1 also indicate, the percentage of all Medicaid births that are VLBW has been remarkably stable at about two percent over the pre/post P4HB time period with a slight increase to 2.2% in CY2013 but a slight decline to 2.1% in 2014. Important to the evaluation of the P4HB program, we have previously reported that the birth weight distribution using claims only is very close to that using the linked vital records for the percentage of very low birth weight infants, at about 2%, but differs from the vital records on the percentage of low birth weight infants and hence, on the percentage of normal birth weight infants. While both sources reflect a stable percentage of Medicaid eligible infants being born VLBW, we ultimately treat the vital records as the ‘gold standard’ when measuring birth weight and work primarily with the linked records when completing the evaluation of P4HB as noted in our text. We do note that the linkage rate, while close to 90% in 2009/2010, fell to around 82% in 2011 but has increased in more recent years to 90%. Based on the linked records, the percentage of VLBW infants paid for by Medicaid has declined slightly to 1.9% from 2.0% in 2009.

Data in table A.3 show that the Medicaid costs for the mother in all deliveries totals about \$357 million and the average costs per mother was \$4,769. The total costs for the 77,966 infants delivered to Medicaid enrolled women in 2014 was almost \$343 million, leading to a total maternal and infant cost of \$700 million to the state Medicaid program. The average amount paid by Medicaid for each infant at delivery was \$4,397 in 2014. As in prior years, the average costs for the infant born VLBW was significantly higher at an estimated \$75,398 in CY2014 when compared to the costs for an infant of normal birthweight; this average equaled \$2,221 in CY2014.

The costs of care for the infants of VLBW continued to be high throughout their first year of life. As shown in Table A.5, the costs for the full first year of life for these infants born in the first six months of CY2014 averaged \$7,667 and totaled over \$12 million. In comparison, the average costs

for the normal birth weight infant was \$2,565 in their first year of life. The bulk of the total cost for all infants in their first year is for the normal weight infants at \$182 million, with a total cost for all infants of \$216 million. Over 90% of all infants born under Medicaid coverage are of normal birth weight. The more the P4HB can ‘shift’ the birthweight distribution toward normal birth weights, the more successful it will be in terms of improving the health of the newborns as well as reducing the costs of the Medicaid program.

## **IX. CONCLUSIONS AND RECOMMENDATIONS**

The data and conclusions reported within this annual report pertain largely to the fourth year of the P4HB Demonstration, however, measures based on linked Medicaid and vital records data are only available for 2013, or PY3, at this time. For the first time, this PY4 Annual Report includes some of the evaluation steps based on the quasi-experimental design originally proposed to CMS.

As reported in prior years, while there have been extensive efforts throughout the state to make women and providers aware of the P4HB program, the percentage of women eligible who actually enrolled in the program has consistently fallen well below the expected numbers. In addition, there was a marked decline in the number of women enrolled in the FP only component of the P4HB program in PY4, leading to less than 5% of eligible women enrolled in this component. As noted in Table 1, the state of Georgia has an estimated 232,000 women who remained uninsured in 2014, and it is likely that many of them would qualify for and benefit from the P4HB program.

A key goal of the P4HB program is to increase the use of family planning services and in turn, the use of effective contraceptive methods among those women not wanting to get pregnant. In prior reports, the increased use of LARCs, one of the most effective contraceptive methods, appeared to be occurring more in the Title X component of the publicly-financed family planning service

system in Georgia (i.e., Title X and Medicaid). The data presented in this report documents the decline in the use of Title X funded services, inclusive of preventive screenings needed by young women. While there was evidence in prior reports that women enrolling in the P4HB FP only component were more likely to use some family planning services during the year than all Medicaid enrolled women ages 18-44 years, the marked decline in P4HB enrollment in the FP only component of the P4HB program indicates that the use of publicly funded family planning and contraceptive services in Georgia has declined.

Given these developments, there is a need for an enhanced effort by DCH to inform providers and their patients about the availability of services through the P4HB program as well as through the broader family planning service provider system in Georgia, including federally qualified health centers (FQHCs) which are the GFPS's participating providers. The state has reached out to the GFPS to coordinate this outreach, and future engagement is planned.

### ***Recommendations***

Currently, the state is providing services under a temporary extension of the P4HB program. This has allowed the state to continue providing needed family planning and related services to women with incomes at or below 200% FPL who remain uninsured. The P4HB program remains an important safety net program for women of reproductive age, allowing access to family planning services. It continues to be important for DCH to work with all providers, including the GFPS providers, to inform women of the program and enroll and retain more of the eligible women in the program.

Specific recommendations are as follows:

1. Reinforce the success of outcomes seen for both the FP only and IPC components of the Demonstration by continuing to work with the CMOs to increase enrollees' awareness of benefits, use of family planning services and if desired, contraceptive services. Regarding the latter, the CMOs and their network of providers should help women be aware of the more effective forms of contraceptives available to them through P4HB, especially LARCs, and the availability of coverage of LARCs in the immediate postpartum period.
2. Initiate another round of outreach to the neonatal intensive care units, particularly the Perinatal Regional Centers, throughout Georgia in which the VLBW infants are cared for in order to inform the social workers, nurse case managers, and physicians of the availability of the IPC component of P4HB, the benefits it provides to enrolled women, and their role in helping eligible women enroll into the program.
3. Monitor the means by and intensity with which the Resource Mothers of the three CMOs are outreaching to engage IPC enrollees to participate in the benefits available to them, and encourage the Resource Mothers across the CMOs to share best practices and lessons learned in interfacing with the IPC enrollees to engage in family planning and preventive services as well as services for the care of chronic conditions.
4. Given the growing enrollment of Resource Mother participants, ensure the CMOs are reaching out to them in the same manner as women in the IPC component regarding the use of effective family planning services as well as the use of the preventive and other services these women have had access to within the traditional Medicaid program.

5. Continue to partner with public health, the GFPS, obstetrical care providers and delivery hospitals to engage them in enrolling women, within the target population, into the P4HB program. Consider a new and enhanced consumer and provider marketing campaign for P4HB that includes information about the renewal (if awarded) and access to Federally Qualified Health Centers (FQHCs), including those that are part of the GFPS, as well as public health department clinics to promote P4HB enrollment and services. Assess and use the most effective targets: media outlets (TV, radio), social media (texts, Face Book, Twitter), and community partners and organizations (churches, beauty salons, health departments, etc.).
6. Monitor the engagement of the CMOs with public health district leaders in parts of the state to see if enrollment of the VLBW infants' mothers in those areas is higher than in other areas of the state without such a coalition and enrollment effort.
7. Evaluate the change in policies beginning in January 2015 that were intended to decrease the time between the eligibility determination and actual CMO enrollment for P4HB benefits.

## APPENDIX A

### DATA ON DELIVERIES AND INFANTS

In this Appendix we provide data on all deliveries and births in CY2014 as part of the annual reporting process. We also report on the full pre and post period of P4HB for which we now have complete claims data and the subset for which we have linked claims/vital records data. For the latter, we compare the information gained from the claims data regarding birth outcomes to that which we observe in the linked data. To this end, we provide a brief summary of the changes we are seeing in the numbers of deliveries and live born infants in the study years.

**Table A.1 Number of Medicaid Paid Births by Birth Weight Based on Claims Data (2009-2014)**

Weight Category	2009		2010		2011		2012		2013		2014	
	N	%	N	%	N	%	N	%	N	%	N	%
<b>VLBW</b>	1,718	2.0	1,650	2.0	1,506	2.0	1,612	2.0	1,716	2.2	1,616	2.1
<b>LBW</b>	4,679	5.5	4,547	5.6	4,210	5.6	4,672	5.9	4,737	6.0	5,098	6.5
<b>Normal BW</b>	78,890	92.4	75,187	92.3	69,331	92.3	73,255	92.0	72,186	91.7	71,214	91.3
<b>Stillbirth</b>	83	0.1	79	0.1	40	0.1	50	0.1	42	0.1	38	0.1
<b>Total</b>	85,370		81,463		75,087		79,589		78,681		77,966	

**Table A.2 Birth Weight Distribution from Claims versus Vital Records (2009-2013)**

	2009		2010		2011		2012		2013	
	Birth Certificate Weight Category	Claims Weight Category %	Birth Certificate Weight Category	Claims Weight Category %	Birth Certificate Weight Category	Claims Weight Category %	Birth Certificate Weight Category	Claims Weight Category %	Birth Certificate Weight Category	Claims Weight Category %
<b>VLBW</b>	2.0%	2.1%	2.0%	2.0%	1.9%	2.1%	1.8%	2.0%	1.9%	2.1%
<b>LBW</b>	8.3%	5.4%	8.5%	5.5%	8.2%	5.5%	8.4%	5.8%	8.4%	5.9%
<b>NORMAL BW</b>	89.7%	92.5%	89.5%	92.5%	89.9%	92.4%	89.8%	92.2%	89.7%	92.0%
<b>Link Rate</b>	89.0%		89.1%		82.2%		90.4%		91.4%	

Distribution of birth weight categories *only* for babies linked to birth certificate.

In prior years we have also reported on the counts of stillborn deliveries, fetal deaths and total and average costs of deliveries paid by Medicaid. These data are shown for CY2014 in Table A.3.

**Table A.3 Medicaid Deliveries for Calendar Year 2014 (CY2014)**

MEASURE	Counts	Total \$ Paid Mother	Average \$ Paid Mother
<u>All Medicaid Deliveries<sup>1</sup></u>			
Total Deliveries <sup>2</sup>	74,794	356,660,427	4,769
Live born deliveries	67,141	346,758,717	5,165
Stillborn deliveries (>= 22 weeks) <sup>1</sup>	937	3,863,304	4,123
Fetal deaths < 22 weeks <sup>1</sup>	6,716	6,038,407	899
<u>Deliveries<sup>1</sup> to Demonstration</u>	6,394	31,709,118	4,959
<b>Entire Demonstration population<sup>6</sup></b>			
Total Deliveries			
Live born deliveries	5,802	30,777,895	5,305
Stillborn deliveries (>= 22 weeks) <sup>1</sup>	81	439,873	5,431
Fetal deaths < 22 weeks <sup>1</sup>	511	491,349	962
<b>FP only<sup>3</sup></b>			
Live born deliveries	5,763	30,540,232	5,299
Stillborn deliveries (>= 22 weeks) <sup>1</sup>	79	439,527	5,564
Fetal deaths < 22 weeks <sup>1</sup>	506	482,197	953
<b>IPC<sup>4</sup></b>			
Live born deliveries	20	118,583	5,929
Stillborn deliveries (>= 22 weeks) <sup>1</sup>	2	347	173
Fetal deaths < 22 weeks <sup>1</sup>	2	2,537	1,268
<b>Resource Mother only<sup>5</sup></b>	19	119,081	6,267
Live born deliveries	0	0	0
Stillborn deliveries (>= 22 weeks) <sup>1</sup>	3	6,615	2,205
Fetal deaths < 22 weeks <sup>1</sup>			

<sup>1</sup> Deliveries were defined as human conceptions ending in live birth, stillbirth (>= 22 weeks gestation), or fetal death (< 22 weeks). Ectopic and molar pregnancies and induced terminations of pregnancy were NOT included.

- **Deliveries of Live births** were identified in the claims by using: ICD-9 diagnostic codes 640-676 plus V27.x OR ICD-9 procedure codes 72, 73, or 74 plus V27.x OR CPT-4 codes 59400, 59409, 59410, 59514, 59515, 59612, 59614, 59620, 59622 plus V27.x
- **Deliveries of Stillbirths** were identified by using ICD-9 code 656.4x (intrauterine fetal death >= 22 weeks gestation) OR specific V-codes [V27.1 (delivery singleton stillborn, V27.3 (delivery twins, 1 stillborn), V27.4 (delivery twins, 2 stillborn), V27.6 (delivery multiples, some stillborn), V27.7 (delivery multiples, all stillborn)].
- **Deliveries associated with Fetal deaths < 22 weeks** were identified by using ICD-9 codes 632 (missed abortion) and 634.xx (spontaneous abortion).
- In the case of a twin or multiple gestations, the delivery was counted as a live birth delivery if ANY of the fetuses lived. Costs were accumulated over the pregnancy and attributed to the delivery event if there was a fetal death (632) that preceded a live birth.

<sup>2</sup> This count of total deliveries omits those with \$0 Medicaid dollars, private third party liability or Medicare coverage (n = 5,172). If these records were included the number of deliveries would be 79,966 with 71,582 live born deliveries, 1,016 stillbirths and 7,368 fetal deaths.

<sup>3</sup> Family planning only participants were identified using Aid Eligibility Code = 181 and the CMO lock-in code; all deliveries that occurred to these women were after their first three months of continuous enrollment in the P4HB; <sup>4</sup> IPC participants were identified using Aid Eligibility Code = 180. Only the deliveries and births to IPC women **subsequent** to their 3<sup>rd</sup> month of enrollment are reported in these tables.

<sup>5</sup> Participants in the Demonstration with Resource Mother only benefits are LIM and ABD classes of eligibility with a delivery and VLBW birth weight infant in the year. They were identified using Aid Eligibility Codes 182 (LIM) and 183 (ABD). Only the deliveries and births to women with LIM and ABD classes of eligibility **subsequent** to their 3<sup>rd</sup> month of enrollment are reported.

<sup>6</sup> Demonstration population includes all women ever enrolled in P4HB prior to delivery in 2014.

## Counts of Infants and Costs 2014

**Table A.4 Infant Counts and Costs for Mother and Infant at the Delivery Hospitalization Calendar Year 2014 (CY2014)**

MEASURE	Counts	Average \$ Paid		
		Mother <sup>3</sup>	Infant Delivery Hospitalization	Infant Delivery Hospitalization
All Medicaid Live births <sup>1</sup>	77,966	5,271	342,839,443	4,397
VLBW	1,616	6,684	121,842,950	75,398
LBW	5,098	5,911	62,669,208	12,293
Normal BW	71,214	5,211	158,148,520	2,221
All Medicaid Stillbirths <sup>2</sup>	38	5,110	178,765	4,704

<sup>1</sup>Liveborn infants were identified and further categorized according to infant birth weight as very low birth weight (VLBW) < 1500 grams, low birth weight (LBW) 1500 – 2499 grams, and normal birth weight >= 2500 grams). Birth weight categories for live born infants were then defined using ICD-9 codes in the encounter data as follows:

- VLBW (< 1500 grams): ICD-9 = 764.xx or 765.xx or V21.3 that pertain to weight < 1500 grams
- LBW (1500 – 2499 grams): ICD-9 = 764.xx or 765.xx or V21.3 that pertain to weight 1500 = 2499 grams

NBW (≥ 2500 grams): ICD-9 = 764.xx or 765.xx or V21.3 that pertain to weight ≥ 2500 grams or not otherwise classified as VLBW, LBW or stillborn.

<sup>2</sup>Stillborn infants were identified using ICD-9 diagnosis codes V35.xx, 768.0, 768.1, or 779.9.

<sup>3</sup>Amounts paid for mothers at the time of delivery were summarized for all deliveries in Table 2 and are summarized here by birth weight of the infant for the subset of mothers (n = 53,924) who could be linked to an infant based on the SSN of the head of the household and other factors used in an algorithm developed by Truven.

**Table A.5 Infant Costs during First Year of Life (Post-Delivery Hospitalization) for Medicaid Live Births**

MEASURE	Infants <sup>1</sup> Born on Medicaid in First 6 Months of CY2014	1 <sup>st</sup> Year of Life Post-Delivery Hospitalization			
		Average \$ Paid per Infants <sup>2</sup> Born in First 6 Months of CY2014 <sup>6</sup>	Total \$ Paid <sup>3</sup> Extrapolated to All Infants <sup>4</sup> from those Born in First 6 Months	Total \$ Paid Extrapolated to Continuously Enrolled Infants <sup>5</sup>	Average \$ Paid per Continuously Enrolled Infants <sup>5</sup>
Medicaid Live births <sup>1</sup> in First 6 Months of 2014	36,600	2,730	215,919,190	211,653,417	2,717
VLBW	506	7,667	12,390,260	13,526,498	9,348
LBW	2,260	4,100	20,900,627	20,648,560	4,147
Normal BW	33,834	2,565	182,628,303	177,478,359	2,541

<sup>1</sup>The 36,600 live born infants born in the first six months of CY2014 were categorized as very low birth weight (VLBW) < 1500 grams, low birth weight (LBW) 1500 – 2499 grams, and normal birth weight >= 2500 grams) as noted in Table A.4.

<sup>2</sup>Costs for all infants born in the first six months of CY2014 are included regardless of their disenrollment or death.

<sup>3</sup>Dollars paid for services for infants in their first year of life were counted beginning with the first service date occurring after their delivery hospitalization discharge date. Paid claims for infants born in CY2014 were complete through June of 2015; expenses paid after this date will not be counted in their first year costs.

<sup>4</sup>Costs for the full first year of the infant's life were only available for those infants born in the first six months of 2014 (and based on claims paid only through September 2014). We used the average costs for this cohort of infants born in the first part of 2014 (n = 36,600) to extrapolate to an annual estimate for CY 2014.

<sup>5</sup>Costs for all infants born in the first six months of CY2014 are included only for those 35,402 alive and continuously enrolled (data on enrollment were only available through December 31, 2014). We used the average costs for this cohort of infants (n = 35,402) to extrapolate to an annual estimate for CY 2014 as shown in the last column.

<sup>6</sup>Omits those with 0 Medicaid dollars, private third party liability or Medicare coverage

## Appendix B. Budget Neutrality Worksheet for Federal Costs in CY2013

Georgia's P4HB Budget Neutrality Worksheet for: FEDERAL COST 2013						
		Quarter 1	Quarter 2	Quarter 3	Quarter 4	TOTAL
<b>WITHOUT DEMONSTRATION - All P4HB Participants (FP and IPC) - FP and associated services (Effective FP?)</b>						
<i>FP and FP-Related Services for All P4HB Pop - 90:10 and reg FMAP rates (multivits, immunizations, admin., etc)</i>	FP Enrollee Member Months	104,043	108,251	119,846	98,617	430,757
	IPC Enrollee Member Months	429	373	285	522	1,609
	PMPM for FP Members FP related Services	\$35.97	\$35.97	\$35.97	\$35.99	\$35.97
	PMPM for IPC Members FP related Services	\$28.95	\$28.95	\$28.95	\$28.95	\$28.95
	<b>Total</b>	<b>\$ 3,754,668</b>	<b>\$ 3,904,401</b>	<b>\$ 4,318,906</b>	<b>\$ 3,564,071</b>	<b>\$ 15,542,218</b>
<b>First Year Infant Costs for VLBW Babies &lt; 1,500 grams (all Medicaid paid births)</b>						
	Estimated Persons					2,117
	Cost per Person	\$ 73,216	\$ 73,568	\$ 62,995	\$ 61,015	\$ 67,698.40
	<b>Total</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 143,317,517</b>
<b>First Year Infant Costs for LBW Babies 1,500 to 2,499 grams (all Medicaid paid births)</b>						
	Estimated Persons					5,768
	Cost per Person	\$ 8,950	\$ 8,848	\$ 8,315	\$ 9,109	\$ 8,805.59
	<b>Total</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 50,790,636</b>
<b>TOTAL WITHOUT- DEMONSTRATION COSTS</b>		<b>\$ 3,754,668</b>	<b>\$ 3,904,401</b>	<b>\$ 4,318,906</b>	<b>\$ 3,564,071</b>	<b>\$ 209,650,371</b>
<b>WITH DEMONSTRATION - IPC SERVICES excl. Resource Mothers Only Participants Only</b>						
<i>Interpregnancy Care Services at the FMAP rate</i>	Member Months	429	373	285	522	1,609
	PMPM	\$ 136	\$ 136	\$ 136	\$ 137	\$ 136.45
	<b>Total</b>	<b>\$ 58,454</b>	<b>\$ 50,823</b>	<b>\$ 38,833</b>	<b>\$ 71,527</b>	<b>\$ 219,636</b>
<b>First Year Infant Costs VLBW Infants &lt; 1,500 grams (all Medicaid paid births adjusted for effect of IPC services)</b>						
	Persons	364	405	403	427	1,599
	Cost per Person	\$ 73,216	\$ 73,568	\$ 62,995	\$ 61,015	\$ 67,698.40
	<b>Total</b>	<b>\$ 26,650,683</b>	<b>\$ 29,795,209</b>	<b>\$25,386,786</b>	<b>\$ 26,053,201</b>	<b>\$ 107,885,879</b>
<b>First Year Infant Costs for LBW Babies 1,500 to 2,499 grams (all Medicaid paid births adjusted for effect of IPC Services)</b>						
	Persons	1,554	1,556	1,739	1,715	6,564
	Cost per Person	\$ 8,950	\$ 8,848	\$ 8,315	\$ 9,109	\$ 8,805.59
	<b>Total</b>	<b>\$ 13,908,792</b>	<b>\$ 13,766,943</b>	<b>\$14,460,539</b>	<b>\$ 15,621,857</b>	<b>\$ 57,758,132</b>
<b>First Year Infant Costs for Normal Weight &gt; 2,500 grams only for women who participated in the IPC</b>						
	Persons	0	1	0	5	6
	Cost per Person		\$ 3,524		\$ 3,176	\$ 3,350.10
	<b>Total</b>	<b>\$ -</b>	<b>\$ 3,524</b>	<b>\$ -</b>	<b>\$ 15,882</b>	<b>\$ 19,405</b>
<b>TOTAL WITH DEMONSTRATION COSTS</b>		<b>\$ 13,982,008</b>	<b>\$ 13,844,035</b>	<b>\$14,523,534</b>	<b>\$ 15,698,753</b>	<b>\$ 165,883,052</b>
<b>DIFFERENCE</b>						<b>\$ 43,767,318</b>

**Budget Neutrality.** The budget neutrality requirement for Georgia's P4HB program, as noted, is based on the potential of the Demonstration to 'shift' the birth weight distribution. Specifically, the budget neutrality spreadsheet requires that the total federal costs for all low and very low birth weight babies plus normal birth weight babies born to IPC enrollees in each Demonstration year must be less than the total federal costs for all low and very low birth weight babies in the *base year* (2008) for the P4HB program to be considered budget neutral. As the program is maturing we are better able to gauge whether the Demonstration prevented enough unintended first births and through better management of the health of women with very low birth weight babies, prevented enough repeat births among this group, such that the distribution of all Medicaid births shifted away from the low and very low birth weight categories.

In this PY4 report we provide data on the third year of the Demonstration, using the claims for CY2014 to give us a full estimate of the first year of life costs for infants born in 2013. We note that the birth weight distribution used in these calculations is based on linked claims and vital records data. Vital records birth weight is used when available and when the newborn does not link to vital records, birth weight is then based on claims data. As shown in the data in the budget neutrality sheet, there were 1,598 VLBW infants and 6,564 LBW infants born under Medicaid coverage in CY2013. The average costs for the delivery and first year of life for infants in these two categories of birth weight were \$67,698 and \$8,806 respectively.

When the total federal costs for the per member per month payments for the family planning only components of the Demonstration and the base year VLBW and LBW infants is totaled it equals approximately \$210 million. To calculate the effects of the Demonstration, we subtract from this total, the costs of the IPC per member per month payments, the 2013 costs for VLBW and LBW infants and the costs of any births to IPC enrollees that are of normal birth weight; these costs total approximately \$166 million. We note that this count of births of normal birthweight to IPC enrollees differs from the count shown in Table 9; in Table 9 only births to IPC women occurring within a 12 month period are counted whereas in the budget neutrality sheet births of normal birthweight to women ever enrolled in IPC women that occurred in 2013 are counted. The difference in these two sums, approximately \$44 million as shown in the bottom of the spreadsheet, constitutes the estimated savings to the federal government from the implementation of the P4HB Demonstration.

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<sup>i</sup> See Kaiser Family Foundation (KFF) Mapping Marketplace Enrollment, ‘What Share of Potential Marketplace Enrollees Signed up for Coverage in 2015’, Available at <http://kff.org/interactive/mapping-marketplace-enrollment/> and The Commonwealth Fund, ‘Residents in the ACA’s Nonparticipating States Still Benefiting’, Available at <http://www.commonwealthfund.org/pulbications/blog/2014/> and KFF, ‘How is the ACA Impacting Medicaid Enrollment?’ Available at <http://kff.org/medicaid/issue-brief/how-is-the-aca-impacting-medicaid-enrollment/> There is some discussion of the accuracy of the numbers reported by Avalere Health, see <http://khn.org/morning-breakout/state-exchange-and-medicaid-issues-under-aca/> although the state is expecting a large increase in enrollment as the transfer of data from the federal exchange to the Department of Community Health (DCH) becomes seamless.