Association of family service needs and level of access difficulty with home visiting services: Oregon's findings from a survey of pregnant women and parents of young children



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American Public Health Association 140th Annual Meeting October 30, 2012











Presenter Disclosures

Jin Song

The following personal financial relationships with commercial interests relevant to this presentation existed during the past 12 months:

No relationships to disclose



BACKGROUND

Survey of pregnant women and parents of young children (Parent Survey)

- Conducted in 2011 as part of Oregon's needs assessment required by the Affordable Care Act (ACA) Maternal, Infant, and Early Childhood Home Visiting (MIECHV) Program
- To assess the service needs of at-risk families in Oregon and the ease or difficulties of getting services.





Study Questions

- ➤ Are there differences between families who received home visiting services and those who did not in:
 - (a) the level of service needs?
 - (b) the level of difficulty getting services?
- ➤ Are there any other notable demographic/family characteristics related to levels of service needs and difficulty getting services?





Parent Survey

Survey development

- Developed by a home visiting needs assessment workgroup
- Tested by parents in home visiting programs
- Survey languages:
 English, Spanish, Russian, Vietnamese, Korean

Survey methods

April – June 2011; a structured written questionnaire; anonymous; non-random sampling, targeted primarily at low-income groups

- (a) Paper survey, distributed by WIC and home visiting programs and returned by mail
- (b) Paper survey, outreach to metro and rural areas
- (c) Online survey, via Internet social media





Parent Survey

Survey content

- List of 32 items of family services:
 - Did anyone in the household need the service in 2010 or 2011?
 - If yes, how easy or difficult was it to get the service?
- Home visiting services
 - Did the respondent receive home visiting services in 2010 or 2011?
- Household demographics
- Screening for children with special health needs



METHODS

Factor analysis; multiple regression analysis

Factor analysis

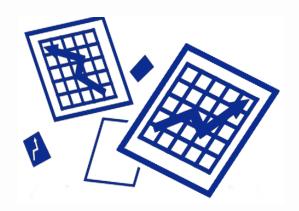
- To identify a small set of factors (types of services) to represent the 32 survey items used to measure families' service needs and difficulty getting the services needed
- Exploratory factor analysis (principal component analysis; oblique rotation)





Multiple regression analysis

- To assess whether levels of families' service needs and difficulties getting services in the factors derived from factor analysis are different:
 - (a) Between respondents who received home visiting services and those who did not;
 - (b) Among respondents of other different demographic/family characteristics





RESULTS

Survey respondents

N = 4,628

51% (2,375) received home visiting services in 2010 or 2011;

42% (1,958) did not;

7% (295) did not answer or were not sure.





Demographic/family characteristics: All respondents

- 94%, female
- 30 years old on average
- 54%, White alone; 34%, Hispanic/Latino of any race
- 79%, a household income at 185% of FPL or below
- 26%, education < high school or GED
- 53%, a child(ren) with special health needs in household
- 27%, single-parent household
- 14%, someone pregnant in household
- 31%, living in rural/frontier counties.



Demographic/family characteristics: Respondents who received home visiting services (vs. those who did not)

- Greater proportion of:
 - Females
 - Hispanic or Latino (of any race)
 - Not employed
 - Single-parent home
 - Household income at 185% of FPL or below
 - English, not the primary language in home
- On average,
 - Younger
 - Less education



Comparison of respondents' demographic/family characteristics

	Received Home Visiting	Did Not Receive Home Visiting
	(n=2,375; 54.8%) ¹	(n=1,958; 45.2%) ¹
Gender: Female**	94.7%	92.2%
Age (mean)***	28.8	32.0
Race/ethnicity***		
White	46.4%	64.3%
Black or African American	2.3%	4.5%
Hispanic or Latino, any race	44.0%	21.3%
Asian/Pacific Islander	3.1%	5.5%
American Indian/Alaska Native	1.1%	1.6%
Other	3.0%	2.7%
Education (mean)***	2.2	2.8
Less than 12th grade (1)	33.1%	17.1%
12th grade or GED (2)	30.5%	21.7%
Some college (3)	24.7%	24.4%
College degree or more (4)	11.7%	36.8%
Employment status***		
Full time	19.1%	35.3%
Part time	18.4%	21.3%
Not working, looking for work	26.1%	21.3%
Not working, not looking for work	36.4%	22.1%

Note: ¹ Percentages and means in the table are based on: (a) the total excluding 'missing' responses.

Chi-square or t tests, ***p < .001; **P < .01 for differences between respondents who received home visiting services and those who did not.



Comparison of respondents' demographic/family characteristics

	Received Home Visiting	Did Not Receive Home Visiting
	(n=2,375; 54.8%) ¹	(n=1,958; 45.2%) ¹
Federal Poverty Level (FPL)2: 185% or		
below***	89.8%	65.9%
Single-parent home***	30.2%	23.1%
English, not primary language in home***	38.5%	22.4%
Someone pregnant in household***	10.5%	17.3%
Families with a child with special health		
needs***	57.2%	46.7%
People with health insurances in		
household***	72.7%	77.6%
Rural/Frontier (vs. Urban) Counties	31.9%	29.8%

Note: 1 Percentages and means in the table are based on the total excluding 'missing' responses.

Chi-square or t-tests, ***p < .001; **P < .01 for differences between respondents who received home visiting services and those who did not.



² Federal Poverty Levels (FPLs) were approximated by using respondents' household income categories and the number of household members.

10 factors derived from 32 survey items

- F1. Parenting needs (6 items)
- F2. Pregnancy/ newborn needs (4)
- F3. Services for special health needs (5)
- F4. Language/ transportation needs (2)
- F5. Basic needs (4)
- F6. Job needs (2)
- F7. Mental health/ substance abuse/ domestic violence (4)
- F8. **Health care needs** (5)
- F9. Child care (1)
- F10. Information about other resources/ services (1)



10 factors (types of services)

Factor 1- Parenting needs

- Information and support about playing with, reading to, and teaching children new things
- 2. Information and support on parenting
- 3. Help with finding out if a child is growing and developing normally
- 4. Information about how to improve diet and nutrition for the family
- 5. Information about how to keep children safe and prevent injuries
- 6. Information and support about how to relate to a baby or young child

(Cronbach's alpha= .88)

Factor 2- Pregnancy/newborn needs

- Information and support about breastfeeding
- 2. Information and support about having a healthy pregnancy
- 3. Information and support about how to care for a newborn
- 4. Information and support about how to relate to a baby or young child

(Cronbach's alpha= .90)



Factor 3- Services for special health needs

- 1. Help getting services for a child with special health needs
- 2. Information on caring for a child with special health needs
- Help with coordinating multiple services a child needs or is receiving
- 4. Health care from a specialist for a child
- Mental health or behavioral health services for a child

(Cronbach's alpha= .79)

Factor 4- Language/ transportation needs

- Translation or interpretation services
- 2. Help with transportation (Cronbach's alpha= .41)

Factor 5- Basic needs

- 1. Help with getting food for the family
- Housing assistance (rent, power, heat, water, phone)
- 3. Help getting health insurance and medical care
- 4. Cash assistance, such as TANF (Cronbach's alpha= .71)



Factor 6- Job needs

- 1. Help with job search
- Help with getting job training or education

(Cronbach's alpha= .78)

Factor 7- Mental health/ substance abuse/domestic violence needs

- 1. Mental health or behavioral health services for a child
- 2. Help for alcohol or drug use or abuse
- 3. Help for domestic violence or sexual violence
- Mental health or behavioral health services for an adult

(Cronbach's alpha= .55)

Factor 8- Health care needs

- 1. General health care for an adult, such as a physical exam
- Dental health care for an adult (including cleanings)
- 3. General health care for a child, such as a well-child exam or physical exam
- Dental health care for a child (including cleanings)
- 5. Health care from a specialist for an adult

(Cronbach's alpha= .66)

Factor 9

Child care (including specialized child care)

Factor 10

 Information about other resources and services that your family may need



Level of Service Needs & Difficulties in 10 Factors

Measures

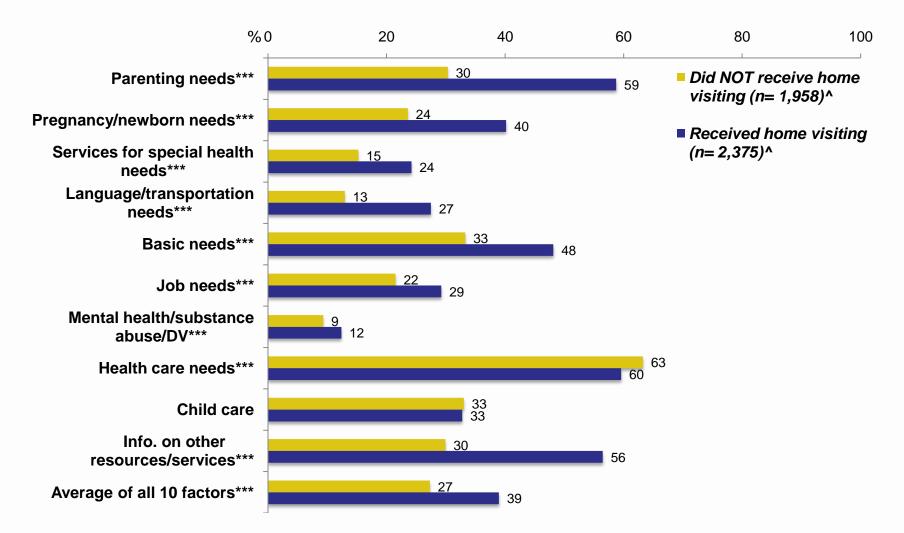
- Level of families' service needs (0-100%)
 - = (Number of the service items needed in a factor
 - Total number of the service items in the factor)
 - **x** 100
- Level of families' difficulty getting services (0-100%)
 - = (Number of the service items that a family had difficulty getting in a factor
 - Number of the service items needed in the factor)

x 100





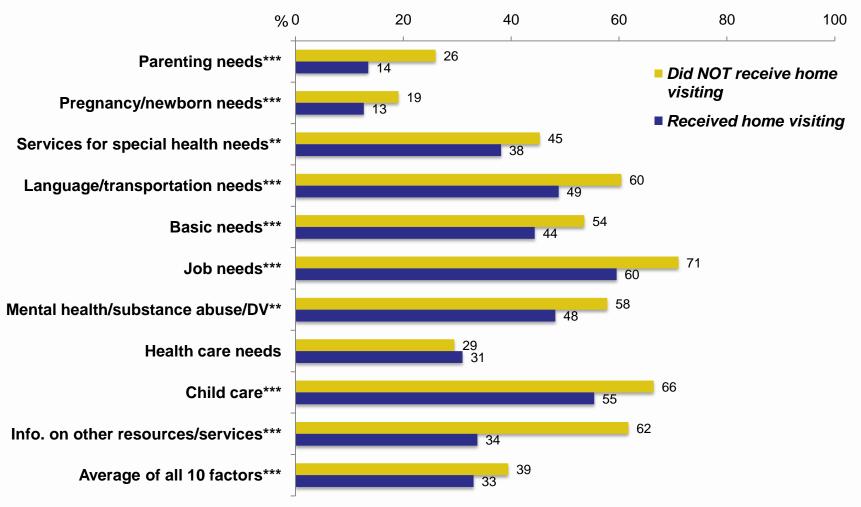
Average level of families' service needs



Note: *The number of respondents is slightly different across the factors due to missing responses. T-tests, ***p < .001 for % differences between families who received home visiting and those who did not



Average level of families' difficulty getting services (among those who needed services)



T-tests, ***p < .001; **p < .01 for % differences between families who received home visiting services and those who did not



To assess differences in levels of service needs and access difficulties, controlling for demographic/family characteristics

- Independent variables
 - Home visiting status
 - 10 demographic/family characteristics
 (race/ethnicity, employment, poverty level, single-parent,
 pregnancy, children with special health needs, English at home,
 rural/urban county, education, household health insurance)
- Dependent variable

In each of 10 factors and the overall average:

- (a) Level of service needs
- (b) Level of difficulty getting the services needed
- 22 regression analyses



Example- Level of service needs in Parenting Factor: Results of multiple regression analysis

	Unstandardized B	
Home Visiting & Demographic Characteristics	(Std. Error)	Standardized Beta
Did not receive home visiting (REF)		
Did receive home visiting	25.86 (1.28)	.34***
White (REF)		
Black or African American		
Hispanic or Latino		
Asian/Pacific Islander		
American Indian/Alaska Native		
Other- 1 or more races	10.29 (3.54)	.05**
Employed, full-time (REF)		
Employed, part time		
Not employed, looking for work		
Not employed, not looking	3.18 (1.37)	.04*
English, primary at home (REF)		
English, not primary at home	11.21 (1.44)	.13***
Urban counties (REF)		
Rural/Frontier counties	-3.78 (1.34)	05**

Note: 1. (REF) indicates a reference group to which all other groups within each characteristic are compared.

- 2. Model statistics: R= .394; R²= .155; F(5, 3238)= 118.78, ***p < .001; **p < .05; **p < .01; *p < .05
- 3. Six demographic characteristics (education, income, single-parent, pregnancy, children with special needs, and household health insurance) were not related to the level of needs in Parenting Factor.

Example- Level of difficulty getting services in Parenting Factor: Results of multiple regression analysis

	Unstandardized B	
Home Visiting & Demographic Characteristics	(Std. Error)	Standardized Beta
Did not receive home visiting (REF)		
Did receive home visiting	-9.48 (1.52)	-0.14***
White (REF)		
Black or African American		
Hispanic or Latino		
Asian/Pacific Islander	14.38 (3.60)	0.08***
American Indian/Alaska Native		
Other- 1 or more races	-7.16 (3.62)	-0.04*
Less educated (REF)		
More educated	1.53 (.71)	0.05*
Employed, full-time (REF)		
Employed, part time		
Not employed, looking for work		
Not employed, not looking	-4.00 (1.46)	-0.06**
Income, above 185% FPL (REF)		
Income, 185% FPL or below	-6.21 (1.92)	-0.08**
No children with special health needs (REF)		
Children with special health needs	8.76 (1.35)	0.13***
Urban counties (REF)		
Rural/Frontier counties	-4.19 (1.49)	-0.06**

Note: 1. (REF) indicates a reference group to which all other groups within each characteristic are compared.

- 2. Model statistics: R= .282; R²= .080; F(8, 2282)= 24.73, ***p < .001; **p < .05
- 3. Four demographic characteristics (single-parent, pregnancy, English speaking at home, and household health insurance) were not related to the level of difficulty in Parenting Factor.

Level of service needs

- Respondents who had received home visiting reported needing more services than those who had not in:
 - all of individual factors except health care
 - the overall average of 10 factors
- The status of receiving home visiting was the strongest predictor of greater service needs in:
 - 3 factors (parenting, pregnancy/newborn and information about other resources/services)
 - the overall average of 10 factors
- Home visiting programs served families with greater needs.

Level of difficulty getting services

- Respondents who had received home visiting reported less difficulty getting the needed services than those who had not in:
 - all of 10 individual factors; the overall average of 10 factors

Home visiting

- the strongest predictor of having less difficulty in 4 factors (parenting, job, mental health/substance abuse/domestic v. and information about other resources/services)
- 2nd strongest predictor of less difficulty in the overall average of 10 factors
- Home visiting programs helped families get the services they needed.

2 other notable demographic/family characteristics

- Families with a child with special health needs
 - More service needs in all individual factors except parenting and pregnancy/newborn;
 2nd strongest predictor of more needs in the overall average of 10 factors
 - More difficulty getting services in all individual factors except language/transportation;

the strongest predictor of more difficulty in the overall

average



2 other notable demographic/family characteristics

- Families who live in urban counties
 - More service needs in:
 - all individual factors except health care and child care
 - the overall average of 10 factors
 - More difficulty getting services in:
 - 5 factors (parenting, pregnancy/newborn, basic needs, health care and information on other resources/services)
 - > the overall average





CONCLUSIONS

Implications

- Home visiting programs in Oregon are successful in:
 - serving families with greater needs
 - helping families get the services they need.
- More outreach and services to population subgroups with greater needs and difficulties, e.g., families with a child with special health needs, urban counties.
- Interventions tailored to ensure identifying and meeting families' service needs.
 - Families with a child with special health needs, likely to need a wide range of services; have difficulty getting services.
 - Urban counties, likely to have difficulty getting 5 types of services (parenting, pregnancy/newborn, basic needs, health care and information on other resources/services)

Limitations

- Parent Survey, not designed to measure causal relationships
 - Asked respondents about needs for family services, access difficulties and receipt of home visiting for the same time period, 2010 or 2011.
 - Causality (corroborating evidence in the literature):
 "Respondents were in need of family services.
 - → Families received home visiting.
 - → Families had less difficulty getting family services."
- No control for extraneous factors, e.g., receiving other program services
- Response bias: self-reported data
 e.g., perceived needs and difficulty may be different, depending on income, race/ethnicity.

Acknowledgments

- Co-authors of this study:
 Jin Song, Kathleen Anger, Wendy Morgan,
 Tenzing Sherpa and Kristen Becker
- Kathryn Broderick, Oregon Health Authority, Center for Prevention and Health Promotion, MCH Assessment, Evaluation and Informatics



- Pregnant women and parents of young children who completed a Parent Survey
- Home visitors and program staff who distributed surveys to respondents or promoted the online survey



Acknowledgments

Oregon Home Visiting Needs Assessment Workgroup

- Oregon Health Authority, Maternal and Child Health:
 Kathryn Broderick, Kathleen Anger, Jin Song,
 Tenzing Sherpa, Kristen Becker, Cynthia Ikata,
 Wendy Morgan
- Oregon Child Development Coalition: Joy Rowley
- Oregon Head Start Programs: Karen Ayers, Jean Wagner
- Family Support & Connections: Stephanie Jernstedt
- Healthy Start~Healthy Families Oregon: Christi Peeples
- OHSU, Oregon Center for Children and Youth with Special Health Needs:
 CaCoon: Marilyn Hartzell, MaryAnn Evans
- Washington County Health Department: Sue Omel
- Office Of Safety and Permanency for Children: Benjamin Hazelton
- Clackamas County Public Health: Marti Franc



Acknowledgments

Oregon Home Visiting Steering Committee

- State Home Visiting Coordinator: Nakeshia Knight-Coyle
- Oregon Commission on Children and Families, Healthy
 Start~Healthy Families Oregon: Iris Bell, Christi Peeples
- Oregon Health Authority, Office of Family Health, Maternal & Child Health:
 Babies First, Maternity Case Management: Katherine Bradley, Cate Wilcox
- Oregon Department of Education Head Start and Early Head Start:
 Dell Ford, Nancy Johnson-Dorn
- Oregon Health Authority, Addictions and Mental Health Division:
 Bill Bouska, Kathy Seubert
- Oregon DHS Division of Children, Adults and Families, Family Support and Connections:
 Erinn Kelley-Siel, Benjamin Hazelton
- Child Development and Rehabilitation Center at Oregon Health & Science University, Oregon Center for Children and Youth with Special Health Needs (OCCYSHN): Marilyn Hartzell
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