

Optimal Birth Spacing



New research shows the strong association between longer birth intervals and improved maternal and child health

Public Health Impact of Optimal Birth Spacing

There are major health benefits to both mothers and children associated with longer birth intervals. Recent research using data from the Demographic and Health Survey (DHS) and the Latin American Centre for Perinatology and Human Development (CLAP) makes the case for birth spacing even more compelling. Below are some highlights of Optimal Birth Spacing (OBS) findings in chart form, followed by an overview of the Schering-Catalyst Partnership.

Birth spacing for at least three years can have tremendous health benefits:

For children:

- Lower risk for fetal death
- Lower risk for preterm birth
- Lower risk for low birth weight
- Lower risk for small for gestational age
- Lower risk for neonatal death
- · Lower risk of stunting and underweight

For mothers:

- Lower risk for maternal death
- Lower risk for third trimester bleeding
- Lower risk for anemia
- Lower risk for premature rupture of membranes
- Lower risk for puerperal endometritis
- Lower risk of malnutrition

Research Shows That Children Benefit from Birth Spacing

Birth Spacing Saves Children's Lives

DHS data from 18 developing countries in Asia, Latin America, Africa and the Middle East¹ shows the sharp decline in risk for neonatal, infant and under-five mortality when births are spaced three years (36 months) or longer (Figure 1).

Compared to a 36-41 month birth interval, a birth interval of less than 18 months is associated with increased risk for:

- Neonatal mortality- 3.17 times
- Infant mortality-3.16 times
- Under-five mortality- 2.81 times

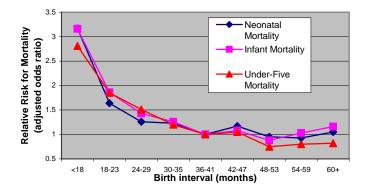
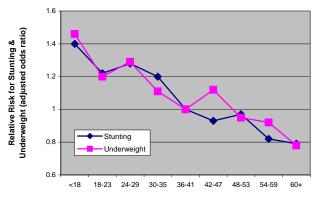


Figure 1. Birth Spacing Saves Children's Lives

Figure 2. Birth Spacing Reduces Risk for Poor Child
Nutrition



Birth interval (months)

Birth Spacing Reduces the Risk for Poor Child Nutrition

The DHS data also reveals that the risks for poor child nutrition dramatically decrease when births are spaced at least three years, and continue to decrease the longer births are spaced (Figure 2).

Compared to a 36-47 month birth interval, a birth interval of less than 18 months is associated with increased risk for:

- Stunting-1.4 times
- Underweight- 1.46 times

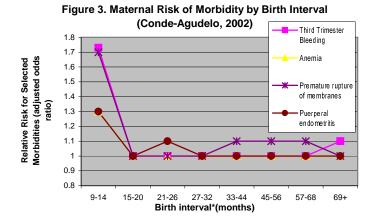
Research Shows That Mothers Benefit from Birth Spacing

Birth Spacing Reduces Risk for Pregnancy-Related Complications

Data from the CLAP database from 19 countries in Latin America² shows a sharp decline in risk for pregnancy-related complications such as third trimester bleeding, anemia, premature rupture of membranes and puerperal endometritis when births are spaced approximately three years (27-32 months) (Figure 3).

Compared to a 27-32 month birth interval*, intervals less than 15 months are associated with increased risk for:

- Third trimester bleeding-1.7 times
- Premature rupture of membranes- 1.7 times
- Anemia-1.3 times
- Puerperal endometritis-1.3 times



In addition, women are at high risk for certain complications if the birth spacing interval is too long. For example, compared to a 27-32 month birth interval*, intervals longer than 69 months are associated with increased risk for pre-eclampsia and eclampsia (1.8 times).

The Schering-Catalyst Partnership

Schering has formed a new partnership with the Catalyst Consortium - a group of five international reproductive health agencies funded by USAID - to disseminate these important new findings about the benefits of longer birth intervals.

Please consider how you might use any or all of the information provided in this Birth Spacing Information Series in your communications plans. We feel it would be advantageous to impart this new and important message to the medical community and consumers.

Additional information available for your use includes:

- A complete Catalyst-Schering Birth Spacing Information Series articles and supplemental information for use in press campaigns
- A list of references of original research
- Expertise in reproductive health programming from Catalyst Consortium, which you can use to develop a birth spacing campaign in conjunction with their programs (in developing countries).

For more information about the Partnership, contact:

Mr. Lutz Schaffran, Schering AG Berlin **Email:**

Ms. Suzanne Brockman, CATALYST Email: sbrockman@rhcatalyst.org

References:

Figure 1 & 2. Rutstein, S. Effects of Birth Interval on Mortality and Health: Multivariate Cross-Country Analysis (2002, May). Presented at OBSI Champions Meeting, Washington, DC.

Figure 3. Conde-Agudelo, A. and Jose M. Belizan. *Maternal Morbidity and Mortality Associated with Interpregnancy Interval: Cross Sectional Study.* British Medical Journal 2000; 321:1255-1259 (18 November).

Footnotes:

- 1 The Demographic and Health Survey (DHS) is a nationally representative survey that measures demographic and family planning trends. The most recent DHS survey data were used for these analyses.
- 2 The Latin American Centre for Perinatology and Human Development (CLAP) collects data on recorded pregnancies of women from 19 countries in Latin America. Data from 1985-1997 were used for these analyses.

*Note: CATALYST and USAID use the Birth Interval to present the data on birth spacing. In order to convert Dr. Conde-Agudelo's data from Interpregnancy Interval to Birth Interval, CATALYST has added nine months to the Interpregnancy Interval (assuming full-term gestation).