





A HEALTHY START

State Health Commissioner Dr. Kristina Box Leads the Charge Against Infant Mortality

Infant mortality is considered to be a window into the health of a nation or a state. Defined by the Centers for Disease Control and Prevention as the number of infant deaths for every 1,000 live births, the infant mortality rate reflects the overall state of maternal health as well as the quality and accessibility of primary health care available to pregnant women and infants.

In Indiana, the infant mortality rate is 7.5. But as Indiana State Health Commissioner Dr. Kristina Box points out, it's about more than a number.

"In 2016, 623 babies in Indiana didn't make it to their first birthday," Box says. "These are children who didn't have the opportunity to grow up. Their families will never celebrate a birthday with them. They'll never watch them graduate or see them get married and have families of their own."

An OB-GYN for more than 30 years, Box has a unique perspective into infant mortality. It is perhaps no surprise, then, that reducing the state's high infant mortality rate is one of her top priorities as she guides the efforts of the state's health department.

"I think children are our state's most precious resource," she says. "How we treat our children and allow them to grow and thrive is an indication of what we value in our state."

A Lifelong Passion

Before starting her position as state health commissioner in October 2017, Box had worked for more than 30 years as an OB-GYN with Indianapolis-based Community Health Network. She began serving as physician lead for the health system's women's service line in 2015. In that role, she established Community Health Network's first multidisciplinary Women's Center, developed critical partnerships with area children's hospitals to improve care and decrease health care costs, and led efforts to ensure low-income women receive free health screenings.

Box has cared for women during some of the happiest moments of their lives—as well as some of their most difficult.

"I tell people that 95 percent of the time, my job is the best, most joyous profession you can have. I experience the most blessed moments," says Box, who still tries to complete an occasional 24-hour hospitalist shift at Community Hospital. "But when things go wrong, when there are complications or tragedies, it is absolutely the most heartbreaking thing to be involved with."

Box also served on Indiana's State Task Force for Neonatal Abstinence Syndrome, which developed a system to identify patients in need of support sooner to help mothers get the addiction treatment they need earlier.

When Gov. Eric Holcomb announced Box's appointment as state health commissioner in September 2017, he praised her extensive experience in addressing both infant mortality and opioid abuse.

"I can think of no one better suited than Dr. Box to lead our state's health department at this critical time in Indiana history," Holcomb said in a statement. "She brings a wealth of deep

knowledge and experience, and she is uniquely qualified to lead our state's efforts to curb infant mortality rates and attack the opioid epidemic."

Holcomb reiterated his commitment to reducing infant mortality in his State of the State speech in January, when he vowed that **Indiana will have the lowest mortality rate in the Midwest by 2024**. Box knows that meeting this goal won't be easy, but she is determined to do her part.

"This is not a needle that moves quickly, but I want to get it to move in the right direction," she says.

Partnering With Hospitals

Hospitals are key partners in the fight to reduce infant mortality, Box notes. She explains that the Indiana State Department of Health (ISDH) and hospitals are already working together on a number of important initiatives that are making an impact. Key among them is their joint work through the Indiana Perinatal Quality Improvement Collaborative (IPQIC), which was formed in January 2013 and is co-chaired by Box and IHA President Brian Tabor. ISDH, IHA, and IPQIC partner on a number of projects to address issues related to prenatal care, including an annual conference on perinatal substance use.

The less formal educational opportunities hospitals provide on a daily basis are also critical, Box notes.

"Hospitals are very engaged in providing education on safe sleep for new parents and their visitors, but also for everyone from housekeeping and dietary to physicians and nurses to everyone who touches that family," she says. "We want to deliver a consistent message."

This includes education on contraception. Pregnancies that are too close together are more likely to result in preterm birth, which is the No. 1 cause of infant mortality.

"We want patients to understand the importance of spacing out their pregnancies," Box says.

Regular prenatal care is vital to ensuring a healthy pregnancy, and all too often, women don't receive it. ISDH is actively working with hospitals across the state to identify patients who may need assistance receiving the care they and their babies need.

"Many times, hospitals see an OB patient early in her pregnancy and then not again until she's 20 weeks in," Box says. "We're working with hospitals to follow up with these patients if needed and ensure they get prenatal care."

Legislators also play an important role in reducing infant mortality, Box notes. The recent passage of a bill requiring ISDH to certify levels of care for mothers and babies at hospitals and birthing centers was a positive step. In the past, Indiana birthing facilities designated their own levels of care based on national standards. Surveys performed by the state health department in recent years found inconsistencies in how hospitals rated themselves, creating confusion for patients trying to determine the right place to deliver their babies.

"We want to make sure babies are delivered at hospitals with the necessary equipment, personnel, and technology. Studies show states with levels of care laws have lower infant mortality, lower maternal morbidity, and lower health care costs," Box says.

Connecting With Communities

Of course, health care involves more than doctors and hospitals. The state's public health departments play a vital role in ensuring the health of Hoosiers by overseeing everything from sewage disposal to restaurant inspections. They also play a critical part in communicable disease control and prenatal care coordination. To learn more about the activities of these local health departments and identify ways



LEFT: Box talks with Evansville Mayor Lloyd Winnecke during an event to launch Vanderburgh County's Pre to 3 program to help reduce infant mortality. CENTER: Box, second from right, and Deputy State Health Commissioner Pam Pontones, far right, present an award to the Clark County Health Department during a visit. Box has made it her goal to visit all 93 local health departments in Indiana. RIGHT: Box talks with Deputy Director Tasha Smith of the ISDH Vital Records Division during the agency's sponsorship of First Responders Day at the Indiana State Fair on Aug. 13.

ISDH can assist them in their efforts, Box has been traveling the state to visit with their staff and seek their feedback.

"I've been able to hear what they think the state is doing well and where we have opportunities for improvement," she says. "I am taking that information back to act on."

While they're all addressing different challenges, they have many things in common—including dedicated teams.

"One thing is consistent: The people working at the health departments are committed to their communities and to giving back to their communities," she says.

Access to care is an issue in Indiana, where 31 counties either don't have a hospital or they have a hospital but no OB delivery services.

"But at the same time, many high-risk pregnancies are located in urban areas, like Indianapolis. Utilization is the issue there, not access. We need to work with local communities and hospitals to reach these high-risk patients," Box says. She notes there are a number of ways communities can partner with the state to reduce infant mortality, including providing

education on safe sleep and helping young adults create a reproductive health plan.

Box notes it's important for everyone involved to address disparities. In Indiana, black babies are more than twice as likely to die in their first year of life than white babies.

"If you don't understand the barriers to care, you won't deploy the necessary resources," she says.

So far, Box has visited about half of the state's public health departments.

"I have been absolutely amazed at how welcoming everyone has been. These visits have been one of the things I've enjoyed the most about my job so far," Box says.

Healthier Hoosiers

In addition to reducing infant mortality, Box is focused on a number of other goals. First, she'd like to see fewer Hoosier smokers. Indiana's current smoking rate of 21 percent is one of the highest in the nation.

"Smoking contributes to so many deaths and so many diseases," she says. "Decreasing the smoking rate would also decrease infant mortality, as women who smoke are much more likely to give birth prematurely and to have low birth weight babies."

Second, Box would like to address mental health, including adverse childhood experiences.

"Research shows that these experiences can lead to negative consequences as young adults or adults, like violence toward themselves or their peers, or substance use disorder," she says.

Finally, Box would like to decrease the state's obesity rate. Currently, 1 in 3 adult Hoosiers are considered obese, and Indiana ranks 40th in the nation in obesity.

"Decreasing obesity would reduce diabetes and hypertension and ultimately reduce heart disease, which is the No. 1 cause of death in Indiana," she says.

In the end, it all comes down to one overarching goal: *improving Hoosier health.*

"Indiana's high infant mortality rate is no surprise considering the state's other health rankings," Box says.

"Indiana is amazing in so many ways. I would like to see us focus on health as much as we focus on workforce development and business across the state."