



07 MAY, 2021

NEW RELIEF FOR MUMS WITH BUBS

Herald Sun, Melbourne

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EXCLUSIVE**BRIGID O'CONNELL**
HEALTH REPORTER

WOMEN would receive a shot of a stem cell-rich treatment straight after birth to prevent them suffering later effects of pelvic floor damage sustained in labour.

That's the end goal for researchers at Melbourne's Hudson Institute of Medical Research, who have developed a world-first stem cell therapy that can repair pelvic birth injury in animals.

One in four women has a pelvic floor disorder after birth, one of which is pelvic organ prolapse. Of these women, 20 per cent will need surgery, typically when in their 50s or 60s, as the sling of muscles, tissues and ligaments supporting pelvic organs becomes weak.

With surgical mesh banned in Australia for treating prolapse following a slew of injuries and legal action, the Hudson's Caroline Gargett said affected women were desperate for help for an injury that could see them needing to avoid exercise or lifting their baby, and one that can cause pain, discomfort or incontinence.

"Given most of the injury to the vagina and the pelvis support systems occurs during childbirth and it doesn't fully heal, and years after they get prolapse, then we really should be treating the cause — the birth injury," Prof Gargett said.

"We think an injection of the cells could really help to pro-

mote full healing."

The potential new treatment is based on Prof Gargett's dis-

covery of stem cells in the endometrium stem cells, and relies on their ability to promote cell repair given they are able to completely rebuild the lining of the womb each month, ready for a new pregnancy.

Lead researcher Shayanti Mukherjee said encasing stem cells in an aloe vera hydrogel protected their potency once they were injected into the pelvic floor of mice.

"The muscles of the pelvic floor stretch three times their capacity during labour. But if the calf muscles are stretched just a bit more than usual, it's a massive injury," she said.

"Once there is a birth injury there is inflammation. What we see with this treatment in our study is that inflammation comes down and it can reverse alterations of the smooth muscles in the vagina."

The next step is to test the treatment in sheep, which have similar pelvic birth injuries to humans.

Courtney Hosken, 35, was diagnosed with prolapse after the birth of her daughter, now 15 months, and now wears a pessary during exercise to stop discomfort. "It means I can go back to high-intensity exercise," she said.

"If there was something they could do straight after birth, I'm all for that."



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THE HUDSON INSTITUTE APPEAL
Raising money for research into women's health conditions
hudson.org.au/support-us/womens-health-appeal/

Courtney Hosken, 35, with Olivia.
Picture: REBECCA MICHAEL