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# Cause of MS and diabetes 'passed on in pregnancy'

SCIENTISTS BELIEVE they may have found the underlying cause of the mysterious "auto-immune" diseases including multiple sclerosis, rheumatoid arthritis and type-1 diabetes.

Microscopic quantities of blood passed between mothers and their babies during pregnancy have been linked with triggering an aberrant attack by the body's immune defences on its own tissues and cells, causing the autoimmune reaction. Researchers have detected genetic material derived from the blood of a mother's son in her own bloodstream up to 20 years after she gave birth. They believe this transfer of

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material in the womb could account for why women are 10 times more likely to develop autoimmune diseases than men.

The findings, presented at the annual meeting of the American Association for the Advancement of Science in San Francisco, could lead to new treatments for many of these conditions. The findings could also explain autoimmune diseases in men and in women who have never had children. They have been found to carry cells that have passed into

their bloodstream from their mothers during pregnancy.

Scientists believe the presence of what is in effect "foreign" material circulating for years in the bloodstream could be the initial trigger that subverts the immune system into attacking different parts of its own body.

Autoimmune diseases are among the top ten killers in the developed world. They range from type-1 diabetes, in which the insulin-secreting cells are destroyed, to rheumatoid arthritis, where the progressive self-destruction of the joints causes pain and immobility.