Scientists reverse engineer a bacterium by sequencing diseased human tissue

Normally, bacteria are identified after investigators obtain a living sample and grow it in laboratory dishes. But in the case of cord colitis–a syndrome discovered only recently–all the researchers had was preserved biopsy specimens from colons of treated patients that weren't alive and couldn't grow. After sequencing the DNA from the specimens and eliminating those identified as human, researchers assembled the bacterium's genome.

"This is to my knowledge is the first example of discovering a new bacteria using sequencing of a human disease tissue specimen," said Ami Bhatt, the lead researcher and a clinical fellow in hematology and oncology at Dana-Faber.

Read the full, original story here: Scientists Solve DNA Puzzle of Infection Tied to Cord Stem Cells