There is a global need for novel contraceptive methods because worldwide about 40% of pregnancies are still unintended, about 42 million pregnancies are terminated by abortion, and 658 women per day die of pregnancy-related problems in the US. Many contraceptive options exist today for women, especially hormonal contraceptive methods in form of tablets, patches, implants, IUDs, etc. However, such agents expose women to both estrogens and progestogens and to an increased risk of thrombosis and bleeding in women predisposed to these conditions. Contraceptive choices for men are limited to condoms and vasectomy, which is largely irreversible. For these reasons, and to provide couples with additional safe and reversible options for contraception, the development of non-hormonal contraceptives for both men and women is highly desirable to assist with family planning and reducing unintended pregnancies. It is promising that more than 50% of men worldwide are open to a male contraceptive agent. In collaboration with the Wolgemuth group at Columbia University we have discovered the non-hormonal male contraceptive agent YCT529 that istargeting retinoic acid receptor alpha, a validated male contraceptive target. Together with our industrial partner Your Choice Therapeutics (YCT) we are developing YCT529 for first-in-human clinical trials. The presentation will discuss the discovery of YCT529and the preclinical efficacy in mouse and non-human primates.

