Claims

1. A non-therapeutic method of improving pregnancy rates in non-human females prior to implantation of an embryo or prior to insemination, comprising administering a composition consisting of IL-12 and GM-CSF as active ingredients into a recipient's vagina.

2. A method according to claim 1 wherein the IL-12 is either IL-12 p40 or IL-12 p70.

3. A method according to any preceding claim wherein IL-12 and GM-CSF are released *in situ* either above or within the approximate physiological range as those found in seminal fluid.

4. A method according to any preceding claim wherein IL-12 and GM-CSF are recombinant.

5. A method according to any preceding claim wherein the composition is in the form of a vaginal insert or an intra-uterine device.

6. A method according to claim 5 wherein the vaginal insert is a vaginal capsule, vaginal gel, vaginal tablet, vaginal powder, vaginal solution, vaginal pessary, vaginal cup, vaginal sponge, vaginal aerosol or vaginal foam or spray.

7. A method according to claim 6, wherein the vaginal insert is a vaginal pessary for transmucosal vaginal delivery of IL-12 and GM-CSF as active ingredients.

8. A method according to any preceding claim, wherein the composition further includes an adjuvant, excipient or carrier.

9. A method according to any preceding claim for rapid delivery, controlled delivery, continuous delivery or pulsed delivery.

10. A method according to any preceding claim for improving pregnancy rates in a rodent.

11. A method according to claim 10 wherein the rodent is a rat or mouse.

12. A method according to any preceding claim for promoting uterine receptivity.

13. A method according to claim 12 for promoting uterine receptivity in a rodent.

14. A method according to claim 13 wherein the rodent is a mouse or rat.

15. A kit of parts comprising a number of vaginal delivery vehicles containing the composition of any of claims 1 to 14 and an apparatus for inserting said vaginal delivery vehicles into the vagina of the recipient non-human female and optionally a set of written instructions therefore.