

CLAIMS

1. An antibody formulation suitable for subcutaneous administration to a patient, the formulation comprising:
 - a) about 100 to about 175 mg/mL of an antibody;
 - b) about 10 mM citrate buffer;
 - c) about 0.1% (w/v) surfactant;
 - d) about 200 mM arginine; and
 - e) about 4.5 to 9% sucrose,wherein the pH of the formulation is about pH 6, wherein the antibody is a fully human anti-CXCR5 antibody, and wherein the antibody comprises a heavy chain comprising the amino acid sequence of SEQ ID NO: 33 and a light chain comprising the amino acid sequence of SEQ ID NO: 32.
2. The antibody formulation of claim 1, wherein the antibody comprises a single chain Fv.
3. The antibody formulation of claim 1, wherein the antibody is an isolated antibody or fragment thereof that specifically binds to the extracellular domain of human CXCR5.
4. The antibody formulation of claim 3, wherein the isolated antibody or fragment thereof comprises the amino acid sequences of RSSKSLHSSGKTYLY (SEQ ID NO: 58), RLSSLA (SEQ ID NO: 68), MQHLEYPYT (SEQ ID NO: 60), GFSLIDYGVN (SEQ ID NO: 61), VIWGDGTTY (SEQ ID NO: 62), and IVY (SEQ ID NO: 63).
5. The antibody formulation of claim 1, wherein the surfactant is a polysorbate.
6. The antibody formulation of claim 1, wherein the polysorbate is polysorbate 20 or polysorbate 80.
7. An antibody formulation, comprising:
 - a) about 175 mg/mL of a humanized IgG4 anti-CXCR5 antibody;
 - b) about 10 mM citrate buffer;
 - c) about 1.0 mg/mL polysorbate 80;
 - d) about 200 mM arginine HCl; and
 - e) about 45 mg/mL sucrose, wherein the pH of the formulation is about pH 6, wherein the humanized IgG4 anti-CXCR5 antibody comprises a heavy chain

comprising the amino acid sequence of SEQ ID NO: 33 and a light chain comprising the amino acid sequence of SEQ ID NO: 32.

8. A container comprising the antibody formulation of any of claims 7.
9. The container of claim 8, wherein the container is a prefilled syringe, a vial, or an autoinjector.
10. A container comprising the antibody formulation of any of claims 7 which has been lyophilized.
11. A kit, comprising the container of any of claims 8, 9, or 10 and a label or instructions for the administration and use of the antibody formulation.
12. The kit of claim 11, wherein administration is by injection.
13. The antibody formulation according to any one of claims 7 for use in a method of diagnosis or treatment of the human or animal body.
14. An antibody formulation of any one of claims 7 for use in treating rheumatoid arthritis.
15. An antibody formulation of any one of claims 7 which has been lyophilized.