

Claims:

1. An anti-idiotypic antibody fused to albumin or a functional fragment of albumin,
wherein the anti-idiotypic antibody is specific for an anti-CD38 antibody having a variable heavy chain domain comprising the amino acid sequence of SEQ ID NO: 7, and a variable light chain domain comprising the amino acid sequence of SEQ ID NO: 8, and
wherein the anti-idiotypic antibody is a Fab fragment.
2. The anti-idiotypic antibody albumin fusion according to claim 1, wherein said anti-idiotypic antibody comprises a variable heavy chain comprising
an HCDR1 of the amino acid sequence of SEQ ID NO: 18,
an HCDR2 of the amino acid sequence of SEQ ID NO: 19,
an HCDR3 of the amino acid sequence of SEQ ID NO: 20, and
a variable light chain comprising
an LCDR1 of the amino acid sequence of SEQ ID NO: 21,
an LCDR2 of the amino acid sequence of SEQ ID NO: 22,
an LCDR3 of the amino acid sequence of SEQ ID NO: 23.
3. The anti-idiotypic antibody fused to albumin according to any one of the preceding claims,
wherein said anti-idiotypic antibody comprises the variable heavy chain of the amino acid sequence of SEQ ID NO: 16, and the variable light chain of the amino acid sequence of SEQ ID NO: 17.
4. The anti-idiotypic antibody fused to albumin according any one of the preceding claims, comprising
a heavy chain comprising the heavy chain amino acid sequence of SEQ ID NO: 24, and
a light chain comprising the light chain amino acid sequence of SEQ ID NO: 25.

5. The monoclonal anti-idiotypic antibody fused to albumin according to claim 1, wherein the anti-idiotypic antibody is an IgG1 isotype.

6. The monoclonal anti-idiotypic antibody fused to albumin according to claim 1, wherein the anti-idiotypic antibody is an IgM isotype.

7. The monoclonal anti-idiotypic antibody fused to albumin according to claim 1, wherein the albumin is a human albumin having the amino acid sequence of SEQ ID NO: 6.

8. The anti-idiotypic antibody fused to albumin according any one of the preceding claims for use in evaluating a blood sample.

9. A nucleic acid encoding the anti-idiotypic antibody fused to albumin according to any one of the preceding claims.

10. A method of evaluating a blood sample obtained from a patient undergoing treatment for multiple myeloma or other gammopathy comprising

a) obtaining a blood sample from said patient,

b) incubating the blood sample with an anti-idiotypic antibody fused to albumin according to any one of claims 1-8,

c) performing immunofixation electrophoresis (IFE), and

d) reporting the results of the IFE,

where the sample is evaluated for total M-protein levels, and

wherein the patient is undergoing treatment with the anti-CD38 antibody having a variable heavy chain domain comprising the amino acid sequence of SEQ ID NO: 7, and a variable light

chain domain comprising the amino acid sequence of SEQ ID NO: 8.

11. An anti-idiotypic antibody that is specific for an anti-CD38 antibody having a variable heavy chain domain comprising the amino acid sequence of SEQ ID NO: 7, and a variable light chain domain comprising the amino acid sequence of SEQ ID NO: 8,
and wherein said anti-idiotypic antibody comprises a variable heavy chain comprising
an HCDR1 of the amino acid sequence of SEQ ID NO: 18,
an HCDR2 of the amino acid sequence of SEQ ID NO: 19,
an HCDR3 of the amino acid sequence of SEQ ID NO: 20, and
a variable light chain comprising
an LCDR1 of the amino acid sequence of SEQ ID NO: 21,
an LCDR2 of the amino acid sequence of SEQ ID NO: 22,
an LCDR3 of the amino acid sequence of SEQ ID NO: 23.