

CLAIMS

1. A pharmaceutical composition comprising:

1) a first multispecific antibody (MA1) comprising

5 a) one binding domain, which specifically binds to CD137 (CD137-BD),
and wherein said CD137-BD comprises

(i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 28, 29 and 30,
respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID
NOs: 34, 35 and 36, respectively; and

10 (ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3
domain framework sequences FR1 to FR4; and

(iii) a VL domain comprising a VL framework comprising framework regions FR1,
FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1
and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4,
15 which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4
comprising an amino acid sequence having at least 70, 80, 90 percent
identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to
SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID
NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO:
20 94 or 101;

and

b) one binding domain, which specifically binds to PDL1 (PDL1-BD), wherein
said PDL1-BD comprises

25 (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 43, 44 and 45,
respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs:
49, 50 and 51, respectively; and

(ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3
domain framework sequences FR1 to FR4; and

30 (iii) a VL domain comprising a VL framework comprising framework regions FR1,
FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1
and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4,
which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4
comprising an amino acid sequence having at least 70, 80, 90 percent identity,
particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID

NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101; or wherein said PDL1-BD comprises

(i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 57, 58 and 59, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 63, 64 and 65, respectively; and

(ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3 domain framework sequences FR1 to FR4; and

(iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101;

2) a second multispecific antibody (MA2) comprising

a) one or two binding domain(s), which specifically bind(s) to a tumor cell associated antigen (TAA-BD),

b) one binding domain, which specifically binds to CD3 (CD3-BD),

3) a pharmaceutically acceptable carrier,

wherein said MA1 does not comprise an immunoglobulin Fc region polypeptide.

2. A kit comprising:

1) a first multispecific antibody (MA1) comprising

a) one binding domain, which specifically binds to CD137 (CD137-BD),
and wherein said CD137-BD comprises

(i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 28, 29 and 30, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 34, 35 and 36, respectively; and

(i) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3 domain framework sequences FR1 to FR4; and

(ii) (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes,

5

particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101;

and

10

b) one binding domain, which specifically binds to PDL1 (PDL1-BD),
and wherein said PDL1-BD comprises

15

(i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 43, 44 and 45, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 49, 50 and 51, respectively; and

(ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3 domain framework sequences FR1 to FR4; and

20

(iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101;

25

or wherein said PDL1-BD comprises

(i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 57, 58 and 59, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 63, 64 and 65, respectively; and

30

(ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3 domain framework sequences FR1 to FR4; and

35

(iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino

acid sequence having at least 70, 80, 90 percent identity,
particularly at least 90 percent identity, to any of SEQ ID NO: 94 to
SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of
SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according
to SEQ ID NO: 94 or 101;

- 2) a second multispecific antibody (MA2) comprising
- a) one or two binding domain(s), which specifically bind(s) to a tumor cell associated antigen (TAA-BD),
 - b) one binding domain, which specifically binds to CD3 (CD3-BD),

wherein said MA1 does not comprise an immunoglobulin Fc region polypeptide.

3. The pharmaceutical composition of claim 1, or the kit of claim 2, wherein said MA1 or both antibodies MA1 and MA2, further comprises one human serum albumin binding domain (hSA-BD).

4. The pharmaceutical composition or the kit of any one of the preceding claims, wherein said CD137-BD comprises

(a) a VH sequence of SEQ ID NO: ~~43~~1 and a VL sequence of SEQ ID NO: ~~44~~37;

(b) a VH sequence of SEQ ID NO: 5 and a VL sequence of SEQ ID NO: 12;

~~(c) a VH sequence of SEQ ID NO: 6 and a VL sequence of SEQ ID NO: 13;~~

~~(d) a VH sequence of SEQ ID NO: 7 and a VL sequence of SEQ ID NO: 14;~~

~~(e) a VH sequence of SEQ ID NO: 22 and a VL sequence of SEQ ID NO: 26;~~

~~(f) a VH sequence of SEQ ID NO: 31 and a VL sequence of SEQ ID NO: 37;~~

~~(g) a VH sequence of SEQ ID NO: 32 and a VL sequence of SEQ ID NO: 38; or~~

~~(h)~~(c) a VH sequence of SEQ ID NO: 33 and a VL sequence of SEQ ID NO: 39;

and/or said PDL1-BD comprises

(a) a VH sequence of SEQ ID NO: 46 and a VL sequence of SEQ ID NO: 52;

(b) a VH sequence of SEQ ID NO: 47 and a VL sequence of SEQ ID NO: 52;

(c) a VH sequence of SEQ ID NO: 48 and a VL sequence of SEQ ID NO: 53;

~~(d) a VH sequence of SEQ ID NO: 60 and a VL sequence of SEQ ID NO: 66;~~

~~(e)~~(d) a VH sequence of SEQ ID NO: 61 and a VL sequence of SEQ ID NO: 67; or

~~(f)~~(e) a VH sequence of SEQ ID NO: 62 and a VL sequence of SEQ ID NO: 66;

and said hSA-BD, if present, comprises

(a) a VH sequence of SEQ ID NO: 74 and a VL sequence of SEQ ID NO: 78;

- (b) a VH sequence of SEQ ID NO: 83 and a VL sequence of SEQ ID NO: 87;
in particular wherein said CD137-BD comprises
- (f) a VH sequence of SEQ ID NO: 31 and a VL sequence of SEQ ID NO: 37;
- (g) a VH sequence of SEQ ID NO: 32 and a VL sequence of SEQ ID NO: 38; or
- 5 (h) a VH sequence of SEQ ID NO: 33 and a VL sequence of SEQ ID NO: 39;
said PDL1-BD comprises
- (a) a VH sequence of SEQ ID NO: 46 and a VL sequence of SEQ ID NO: 52;
- (b) a VH sequence of SEQ ID NO: 47 and a VL sequence of SEQ ID NO: 52; or
- (c) a VH sequence of SEQ ID NO: 48 and a VL sequence of SEQ ID NO: 53;
- 10 and said hSA-BD, if present, comprises
- (a) a VH sequence of SEQ ID NO: 74 and a VL sequence of SEQ ID NO: 78;
- (b) a VH sequence of SEQ ID NO: 83 and a VL sequence of SEQ ID NO: 87.
5. The pharmaceutical composition or the kit of any one of claims 1 to 4, wherein
- 15 said MA1 is selected from the ~~scDb-s of SEQ ID NOs: 105, 106, 107, 108, 109,~~
~~110, and 111 and from the scDb-scFvs of SEQ ID NOs: 112, 113, 114, 115, 116,~~
~~117, 118, 119, 120, 121, 122, 123, 124, 125, 126, 127, 128, 129 and 130,~~
~~preferably wherein said MA1 is selected from the scDb-scFvs of SEQ ID NOs:~~
~~112, 113, 114, 115, 116, 117, 118, 119, 120, 121, 122, 123, 124, 125, 126, 127,~~
20 ~~128, 129 and 130, more preferably wherein said MA1 is selected from the scDb-~~
~~scFvs of SEQ ID NO: 125, 126, 127 and 130, in particularly wherein said MA1 is~~
~~selected from the scDb-scFvs of SEQ ID NO: 125, 127 and 130.~~
6. The pharmaceutical composition or the kit of any one of the preceding claims,
- 25 wherein the tumor cell associated antigen (TAA) is selected from the group
consisting of CD138, CD79b, TPBG (5T4), HER2, MSLN, MUC1, CA-125
(MUC16), PSMA, BCMA, CD19, EpCAM, CLEC12A (CLL1), CD20, CD22, CEA,
CD33, EGFR, GPC3, CD123, CD38, CD33, CD276, CDH3 (cadherin 3), FGFR1,
SSTR2, CD133, EPHA2, HLA-A2, IL13RA2, ROR1, CEACAM6, CD135, GD-2,
30 GA733, CD135 (FLT3), CSPG4 and TAG-72,
preferably, wherein the TAA is selected from the group consisting of CD138,
CD79b, CD123, HER2, MSLN, PSMA, BCMA, CD19, CD20, CEA, CD38, CD33,
CLEC12a and ROR1,
in particular wherein the TAA is selected from the group consisting of HER2,
35 MSLN and ROR1.

7. The pharmaceutical composition or the kit of any one of the preceding claims, wherein said MA2 comprises one TAA-BD.
- 5 8. The pharmaceutical composition or the kit of claim 7, wherein the TAA-BD is a mesothelin binding domain (MSLN-BD), which specifically binds to mesothelin (MSLN), particularly a MSLN-BD comprising
- 10 (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 139, 140 and 141, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 143, 144 and 145, respectively; and
- (ii) VH3 or VH4 domain framework sequences FR1 to FR4; preferably VH3 domain framework sequences FR1 to FR4; and
- 15 (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any
- 20 of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101,
- particularly a MSLN-BD comprising
- a) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 139, 140 and 141, respectively,
- 25 b) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 143, 144 and 145, respectively,
- c) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 142, and
- d) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical
- 30 to the amino acid sequence SEQ ID NO: 146;
- or
- a HER2 binding domain (HER2-BD), which specifically binds to HER2 (HER2), particularly a HER2-BD comprising

- (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 165, 166 and 167, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 170, 171 and 172, respectively; and
- (ii) VH3 or VH4 domain framework sequences FR1 to FR4; preferably VH3 domain framework sequences FR1 to FR4; and
- (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101.
- particularly a HER2-BD comprising
- a) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 165, 166 and 167, respectively,
- b) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 170, 171 and 172, respectively,
- c) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 168 or 169, and
- d) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 173 or 174;
- or
- a ROR1 binding domain (ROR1-BD), which specifically binds to ROR1, particularly a ROR1-BD comprising
- (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 215, 216 and 217, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 218, 219 and 220, respectively; and
- (ii) VH3 or VH4 domain framework sequences FR1 to FR4; preferably VH3 domain framework sequences FR1 to FR4; and
- (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90

- percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a V λ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a V λ FR4 according to SEQ ID NO: 94 or 101,
- 5 particularly a ROR1-BD comprising
- a) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 215, 216 and 217, respectively,
 - b) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 218, 219 and 220, respectively,
 - 10 c) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 221 or 222, and
 - d) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 223.
- 15 9. The pharmaceutical composition or the kit of any one of claims 1 to 6, wherein the MA2 comprises two TAA-BDs, particularly two TAA-BDs, which bind to the same antigen.
- 20 10. The pharmaceutical composition or the kit of claim 9, wherein said TAA-BDs are mesothelin binding domains (MSLN-BDs), which specifically bind to mesothelin (MSLN), particularly MSLN-BDs comprising
- (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 147, 148 (or 151) and 149, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 153, 154 and 155, respectively; or the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 157, 158 and 159, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 161, 162 and 163, respectively; or the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 197, 198 and 199, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 200, 201 and 202, respectively; and
 - 25 (ii) VH3 or VH4 domain framework sequences FR1 to FR4; particularly VH3 domain framework sequences FR1 to FR4; and
 - (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from V κ subtypes, particularly from the V κ 1 and V κ 3 subtypes, particularly are of the V κ 1 subtype, and a framework FR4,
 - 30 which is selected from a V κ FR4 and a V λ FR4, particularly is a V λ FR4
 - 35

comprising an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101;

particularly MSLN-BDs comprising

a.1) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 147, 148 (or 151) and 149, respectively,

b.1) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 153, 154 and 155, respectively,

c.1) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 150, and

d.1) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 156;

or

a.2) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 147, 148 (or 151) and 149, respectively,

b.2) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 153, 154 and 155, respectively,

c.2) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 152, and

d.2) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 156;

or

a.3) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 157, 158 and 159, respectively,

b.3) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 161, 162 and 163, respectively,

c.3) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 160, and

d.3) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 164;

or

a.4) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 157, 158 and 159, respectively,

- b.4) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 161, 162 and 163, respectively,
- c.4) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 194 or 195, and
- 5 d.4) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 196;
- or
- a.5) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 197, 198 and 199, respectively,
- 10 b.5) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 200, 201 and 202, respectively,
- c.5) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 203 or 204, and
- d.5) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 205.
- 15
11. The pharmaceutical composition or the kit of claim 9, wherein said TAA-BDs are ROR1 binding domains (ROR1-BDs), which specifically bind to ROR1, particularly ROR1-BDs comprising
- 20 (i) the HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 206, 207 and 208, respectively, and the LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 209, 210 and 211, respectively; and
- (ii) VH3 or VH4 domain framework sequences FR1 to FR4; preferably VH3 domain framework sequences FR1 to FR4; and
- 25 (iii) a VL domain comprising a VL framework comprising framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising an amino acid sequence having at least 70, 80, 90
- 30 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101,
- particularly ROR1-BDs comprising

- a.1) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 206, 207 and 208, respectively,
 - b.1) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 209, 210 and 211, respectively,
 - 5 c.1) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 212, and
 - d.1) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 214;
 - or
 - 10 a.2) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 206, 207 and 208, respectively,
 - b.2) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 209, 210 and 211, respectively,
 - c.2) a VH sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent
 - 15 identical to the amino acid sequence SEQ ID NO: 213, and
 - d.2) a VL sequence at least 90, 91, 92, 93, 94, 95, 96, 97, 98 or 99 percent identical to the amino acid sequence SEQ ID NO: 214.
12. The pharmaceutical composition or the kit of any of the preceding claims, wherein
- 20 said CD3-BD comprises
- (i) HCDR1, HCDR2, and HCDR3 sequences of SEQ ID NOs: 131, 132 and 133, embedded in an antibody VH framework, particularly in a human antibody VH framework, particularly in a human VH3 framework, and
 - (ii) LCDR1, LCDR2, and LCDR3 sequences of SEQ ID NOs: 135, 136 and 137,
 - 25 embedded in an antibody VH framework, particularly in a human antibody VL framework, wherein the VL framework comprises framework regions FR1, FR2 and FR3, which are selected from Vk subtypes, particularly from the Vk1 and Vk3 subtypes, particularly are of the Vk1 subtype, and a framework FR4, which is selected from a Vk FR4 and a Vλ FR4, particularly is a Vλ FR4 comprising
 - 30 an amino acid sequence having at least 70, 80, 90 percent identity, particularly at least 90 percent identity, to any of SEQ ID NO: 94 to SEQ ID NO: 101, more particularly a Vλ FR4 selected from any of SEQ ID NO: 94 to SEQ ID NO: 101, particularly a Vλ FR4 according to SEQ ID NO: 94 or 101;
- particularly wherein said CD3-BD comprises

- (i) a VH domain comprising the amino acid sequence of SEQ ID NO: 134 or 182, and
- (ii) a VL domain comprising the amino acid sequence of SEQ ID NO: 138.

5 13. The pharmaceutical composition or the kit of any of the preceding claims, wherein said hSA-BD comprises

- (i) a VH domain comprising the amino acid sequence of SEQ ID NO: 74, and a VL domain comprising the amino acid sequence of SEQ ID NO: 78; or
- 10 (ii) a VH domain comprising the amino acid sequence of SEQ ID NO: 83, and a VL domain comprising the amino acid sequence of SEQ ID NO: 87; or
- (iii) a VH domain comprising the amino acid sequence of SEQ ID NO: 190, and a VL domain comprising the amino acid sequence of SEQ ID NO: 192; or
- (iv) a VH domain comprising the amino acid sequence of SEQ ID NO: 191, and a VL domain comprising the amino acid sequence of SEQ ID NO: 192; or
- 15 (v) a VH domain comprising the amino acid sequence of SEQ ID NO: 189, and a VL domain comprising the amino acid sequence of SEQ ID NO: 193.

14. The pharmaceutical composition or the kit of any one of the preceding claims, wherein said MA2 is selected from the group consisting of:

20 the scMATCH3-based antibodies of SEQ ID NOs: 175, 180, 181, 236 and 237; and

the MATCH4-based heterodimeric antibodies of SEQ ID NOs: 176 and 177, 178 and 179, 224 and 225, 226 and 227, 228 and 229, 230 and 231, 232 and 233, 234 and 235, 238 and 239 and 240 and 241.

25

15. The pharmaceutical composition or the kit of any one of claims 1 to 14 for use in the treatment of a disease, particularly a human disease, more particularly a human disease selected from cancer, particularly a cancer selected from mesothelioma, pancreatic cancer, gastric cancer, lung cancer, breast cancer and

30 ovarian cancer, an inflammatory and an autoimmune disease.

16. A method for the treatment of a disease, particularly a human disease, more particularly a human disease selected from cancers, particularly a cancer selected from mesothelioma, pancreatic cancer, gastric cancer, lung cancer, breast cancer

and ovarian cancer, comprising the step of administering the pharmaceutical composition or the kit of any one of claim 1 to 14.

- 5 17. A method for treating a patient suffering from cancer, particularly a cancer selected from melanoma, mesothelioma, pancreatic cancer, stomach cancer, breast cancer, ovarian cancer and lung cancer, comprising the step of administering a first multispecific antibody (MA1) comprising one binding domain, which specifically binds to CD137 (CD137-BD), and one binding domain, which specifically binds to PDL1 (PDL1-BD), and a second multispecific antibody (MA2)
10 comprising at least one binding domain, which specifically binds to a tumor cell associated antigen (TAA-BD), and one binding domain, which specifically binds to CD3 (CD3-BD), to said patient, wherein said MA1 and MA2 are as defined in claims 1 to 14.