CLAIMS

1. A floating flap gate installed on an entrance portion of a building in order to block the entrance portion at a time of rising water, and configured so that a gate leaf is able to swing upward around a proximal end side of the gate leaf as a fulcrum, the floating flap gate comprising:

an upward swinging support portion provided on the proximal end side of the gate leaf;

wherein the swinging support portion comprises;

a first member mounted to an end portion of the gate leaf on the proximal end and having a convex circular arc-shaped surface; and

a second member having a concave circular arc-shaped surface to be mated with the convex circular arc-shaped surface of the first member, configured to support the gate leaf in a raised state as a receiving seat to receive a portion where the convex circular arc-shaped surface is formed.

2. The floating flap gate according to claim 1, further comprising;

a waterproof membrane disposed on a surface side of each of the first member and second member so as to cover the first and second members;

a first seal clamp mounted on the surface side of the first member so as to integrally sandwich a portion of the waterproof membrane which portion covers the first member, between itself and the first member; and

a second seal cramp mounted on the surface side of the second member so as to integrally sandwich another portion of the waterproof membrane which portion covers the second member, between itself and the second member

or a base disposed on the proximal end side of the gate leaf.

3. The floating flap gate according to claim 1 or 2, wherein

the first member has a length equal to a width of the gate leaf, and

the second member is equal in length with the first member.

4. The floating flap gate according to claim 2 or 3, wherein when the gate leaf in a raised state has floated up due to buoyancy and water pressure, the gate leaf is supported via the waterproof membrane at an end portion of the second seal clamp on a side of the first seal clamp.

5. The floating flap gate according to any one of claims 1 to 4, wherein when the gate leaf is lowered, a gap is present between the convex circular arc-shaped surface of the first member and the concave circular arc-shaped surface of the second member.

6. The floating flap gate according to any one of claims 1 to 5, wherein the first member is made of metal and the second member is made of resin.