CLAIMS

[Claim 1]

A refrigerator comprising:

a storage compartment defined by thermally insulating walls and having a front being open;

a cold air duct extending in a vertical direction of the refrigerator along an inner face of a back wall of the storage compartment, the cold air duct including a cold air passage configured to deliver cold air; and

a cold air discharge port configured to discharge cold air delivered through the cold air passage into the storage compartment,

the cold air passage having an elliptical cross section.

[Claim 2]

The refrigerator of claim 1, wherein the cold air duct is disposed at a middle in a horizontal direction of the storage compartment.

[Claim 3]

The refrigerator of claim 1 or 2, wherein the cold air passage has the elliptical cross section of an ellipticity ranging from 0.36 to 1, where the ellipticity is defined as a ratio of a minor axis to a major axis of the elliptical cross section.

[Claim 4]

The refrigerator of any one of claims 1 to 3, wherein the major axis of the elliptical cross section of the cold air passage is parallel to the horizontal direction of the storage compartment.

[Claim 5]

The refrigerator of any one of claims 1 to 4, further comprising a shelf disposed inside the storage compartment, wherein

the cold air duct protrudes from the inner face of the back wall of the storage compartment to inside of the storage compartment, and

the shelf has a cutout formed along a contour of the cold air duct.

[Claim 6]

The refrigerator of any one of claims 1 to 5, comprising:

a plurality of the storage compartments; and

a plurality of the cold air passages configured to deliver cold air discharged into the respective storage compartments,

wherein each of the cold air passages has an elliptical cross section.

CLAIMS

[Claim 1]

A refrigerator comprising:

a storage compartment defined by thermally insulating walls and having a front being open;

a cold air duct extending in a vertical direction of the refrigerator along an inner face of a back wall of the storage compartment, the cold air duct including a cold air passage configured to deliver cold air; and

a cold air discharge port configured to discharge cold air delivered through the cold air passage into the storage compartment,

the cold air passage having an elliptical cross section not being analogous to a cross section of the cold air duct.

[Claim 2]

The refrigerator of claim 1, wherein the cold air duct is disposed at a middle in a horizontal direction of the storage compartment.

[Claim 3]

The refrigerator of claim 1 or 2, wherein the cold air passage has the elliptical cross section of an ellipticity ranging from 0.36 to 1, where the ellipticity is defined as a ratio of a minor axis to a major axis of the elliptical cross section.

[Claim 4]

The refrigerator of any one of claims 1 to 3, wherein the major axis of the elliptical cross section of the cold air passage is parallel to the horizontal direction of the storage compartment.

[Claim 5]

The refrigerator of any one of claims 1 to 4, further comprising a shelf disposed inside the storage compartment, wherein

the cold air duct protrudes from the inner face of the back wall of the storage compartment to inside of the storage compartment, and

the shelf has a cutout formed along a contour of the cold air duct.

[Claim 6]

The refrigerator of any one of claims 1 to 5, comprising:

a plurality of the storage compartments; and

a plurality of the cold air passages configured to deliver cold air discharged into the respective storage compartments,

wherein each of the cold air passages has an elliptical cross section.