Claims

1. A pump for pumping liquid comprising solid matter, comprising an impeller and an axially extending drive shaft assembly, wherein a distal end of the drive shaft assembly is received in a central recess of the impeller, the drive shaft assembly comprising a drive shaft and a connector, wherein the connector comprises a sleeve that is in telescopic engagement with the drive shaft, the impeller during operation of the pump being displaceable in the axial direction in relation to said sleeve between a distal rest position and a proximal position, wherein the impeller is biased towards the distal rest position by means of a spring member arranged between the sleeve and the impeller, the connector comprising a hollow adjustment screw that is in threaded engagement with an interior side of the sleeve and configured to limit the maximum degree of telescopic overlap between the sleeve and the drive shaft, wherein an impeller screw extends through the adjustment screw and is in threaded engagement with the drive shaft in order to press the adjustment screw towards the drive shaft.

2. The pump according to claim 1, wherein the distal end of the drive shaft has the shape of a truncated cone and the pump comprises a socket, the socket being wedged between the interior side of the sleeve of the connector and the distal end of the drive shaft.

3. The pump according to claim 2, wherein the adjustment screw is configured to wedge the socket between the interior side of the sleeve of the connector and the distal end of the drive shaft.

4. The pump according to any preceding claim, wherein the impeller is an open impeller comprising a hub, an upper cover disc and at least one blade connected to said cover disc.

5. The pump according to any preceding claim, wherein the impeller comprises a hub, said hub comprising a through hole that extends in the axial direction, wherein the sleeve is arranged in said through hole of the impeller, and wherein a gap is arranged between a distal portion of the sleeve and the hub of the impeller, said gap being adjacent a cavity that houses said spring member.

6. The pump according to claim 5, wherein a seal is arranged at the gap, in order to prevent any solid matter in the pump liquid from entering said cavity.

7. The pump according to claim 5 or 6, wherein the seal is arranged in a circumferential groove in the through hole of the impeller.

8. An impeller assembly for a pump suitable for pumping liquid comprising solid matter, comprising an impeller having a central recess and a connector, wherein the connector comprises a sleeve arranged in the central recess of the impeller, wherein the sleeve is configured to be in telescopic engagement with an axially extending drive shaft, the impeller being displaceable in the axial direction in relation to said sleeve between a distal rest position and a proximal position, wherein the impeller is biased towards the distal rest position by means of a spring member arranged between the sleeve and the impeller, the connector comprising a hollow adjustment screw that is in threaded engagement with an interior side of the sleeve and configured to limit the maximum degree of telescopic overlap between the sleeve and the drive shaft.