CLAIMS

1. A device for coating a stent, comprising a holder for the stent, a spraying unit with a spray mandrel and an air nozzle, wherein the spray mandrel, the air nozzle and the holder are designed and disposed relative to each other such that the spray mandrel projects into the sent from one side during coating and the air nozzle projects into the stent from the opposing side.

2. The device according to claim 1, wherein the device is designed such that the position of the stent in relation to the spray mandrel and the air nozzle can be varied during coating.

3. The device according to claim 2, wherein the holder is designed such that, during coating, the stent can be moved in the direction of the spray mandrel or in the direction of the air nozzle.

4. A device according to any one of claims 1 to 3, wherein the spraying unit comprises a spray nozzle, which is directed at an abluminal side of the stent.

5. A method for coating a stent, comprising the following steps:
   a) providing a device for coating the stent according to either claim 1 or 3;
   b) coating the luminal side of the stent by introducing a spray jet via the spray mandrel and an air flow via the air nozzle such that the spray jet is deflected radially outwardly by the air flow in the counterflow region; and
   c) displacing a position of the counterflow region relative to the stent by at least one of the measures selected from moving the stent, moving the spray mandrel, moving the air nozzle, regulating the spray jet, and regulating the air flow.

6. The method according to claim 5, wherein in step a) a device for coating the stent according to claim 4 is provided and, for coating the abluminal side of the stent, a spray jet of the spray nozzle is directed at the counterflow region (i) while carrying out steps b) and c), and/or (ii) subsequently to steps b) and c) and/or (iii) before steps b) and c) a spray jet is directed at the outside of the stent, wherein in the interior of the stent an air flow is generated by means of the air nozzle or a spray jet is generated by means of the spray mandrel, or both are generated simultaneously.

7. The method according to claim 6, wherein the luminal and abluminal sides are coated with differing active agents.

8. The method according to claim 7, wherein a healing-promoting active agent is applied to the luminal side.

9. The method according to claim 8, wherein the healing-promoting active agent is atorvastatin.

10. The method according to claim 7, wherein a proliferation-inhibiting active agent is applied to the abluminal side.

11. The method according to claim 10, wherein the proliferation-inhibiting active agent is sirolimus or a derivative thereof.

12. A method according to any one of claims 7 to 11, wherein the active agents are embedded in a carrier matrix.

13. The method according to claim 12, wherein the carrier matrix is biocorrodible.

14. The method according to claim 13, wherein the carrier matrix comprises PLLA.

15. A stent, produced according to a method according to any one of claims 5 to 14.

CLAIMS

1. A method for coating a stent, comprising the following steps:

a) coating the luminal side of the stent using a device comprising a holder for the stent, a spraying unit with a spray mandrel and an air nozzle, wherein the spray mandrel, the air nozzle and the holder are arranged for disposal relative to each other for the spray mandrel to project into the stent from one side during coating and for the air nozzle to project into the stent from the opposing side,

wherein the device is arranged for the position of the stent in relation to the spray mandrel and the air nozzle to be varied during coating the coating being made and wherein the holder is arranged such that, during coating, the stent can be moved in the direction of the spray mandrel or in the direction of the air nozzle and

wherein the spraying unit comprises a spray nozzle, arranged for direction at an abluminal side of the stent,

the coating being carried out by introducing a spray jet via the spray mandrel and an air flow via the air nozzle such that the spray jet is deflected radially outwardly by the air flow in a counterflow region; and

b) displacing a position of the counterflow region relative to the stent by at least one of the measures selected from moving the stent, moving the spray mandrel, moving the air nozzle, regulating the spray jet, and regulating the air flow; and,

c) for coating the abluminal side of the stent, a spray jet of the spray nozzle is directed at the counterflow region while carrying out steps a) and b), a spray jet is directed at the outside of the stent, wherein in the interior of the stent an air flow is generated by means of the air nozzle and a spray jet is generated by means of the spray mandrel are generated simultaneously.

2. The method according to claim 1, wherein the luminal and abluminal sides are coated with differing active agents.

3. The method according to claim 2, wherein a healing-promoting active agent is applied to the luminal side.

4. The method according to claim 3, wherein the healing-promoting active agent is atorvastatin.

5. The method according to claim 2, wherein a proliferation-inhibiting active agent is applied to the abluminal side.

6. The method according to claim 5, wherein the proliferation-inhibiting active agent is sirolimus or a derivative thereof.

7. A method according to any one of claims 1 to 6, wherein the active agents are embedded in a carrier matrix.

8. The method according to claim 7, wherein the carrier matrix is biocorrodible.

9. The method according to claim 8, wherein the carrier matrix comprises PLLA.