Additionally, or alternatively, the liquid may comprise at least one humectant. Suitable humectants include at least one of glycerol, malitol, xylitol, sorbitol, polyethylene glycol, triethylene glycol, butylene glycol, glycerin, polydextrose, and combinations thereof.

In any of the embodiments described above, the liquid may be substantially colourless. Alternatively, the liquid may be coloured. Coloured liquids may be preferable in those embodiments in which the liquid delivery element is formed from a substantially transparent material so that the coloured liquid is visible through the substantially transparent liquid delivery element and any overlying layers of material, as described above. Additionally, or alternatively, any layers of material overlying the at least one filter segment into which the liquid is delivered when the liquid delivery element is activated may be substantially transparent and, additionally or alternatively, any overlying layers of material may comprise one or more apertures through which the at least one filter segment is visible. In such embodiments, the coloured liquid is visible through the substantially transparent material and, additionally or alternatively, through the one or more apertures, after the liquid has been delivered to the at least one segment of filter material. Such overlying layers of material may include one or more plug wraps and a tipping wrapper. In a particularly preferred embodiment, the liquid is a coloured liquid, the liquid delivery element comprises a frangible portion at its upstream end configured to deliver the coloured liquid to an upstream filter segment when the liquid delivery element is activated, the aerosol-generating article comprising a substantially transparent wrapper overlying at least a portion of the upstream filter segment, and a tipping wrapper comprising at least one aperture at least partially overlying the substantially transparent wrapper and the upstream filter segment.

Aerosol-generating articles according to the present invention may be filter cigarettes or other aerosol-generating articles in which the aerosol-generating substrate comprises a tobacco material that is combusted to form smoke. Therefore, in any of the embodiments described above, the aerosol-generating substrate may comprise a tobacco rod.

Alternatively, aerosol-generating articles according to the present invention may be articles in which a tobacco material is heated to form an aerosol, rather than combusted. In one type of heated aerosol-generating article, a tobacco material is heated by one or more electrical heating elements to produce an aerosol. In another type of heated aerosol-generating article, an aerosol is produced by the transfer of heat from a combustible or chemical heat source to a physically separate tobacco material, which may be located within, around or downstream of the heat source. The present invention further encompasses aerosol-generating articles in which a nicotine-containing aerosol is generated from a tobacco material, tobacco extract, or other nicotine source, without combustion, and in some cases without heating, for example through a chemical reaction.

According to another aspect, there is provided an aerosol-generating article having a length extending in a longitudinal direction between upstream and downstream ends of the aerosol-generating article, the aerosol-generating article having a substantially circular cross-sectional shape defining a circumferential direction extending around the longitudinal direction and a radial direction orthogonal to the longitudinal direction and the circumferential direction, the aerosol-generating article comprising an aerosol-generating substrate and a mouthpiece secured to a downstream end of the aerosol-generating substrate, the mouthpiece comprising at least one segment of filter material and a liquid delivery element, the liquid delivery element comprising: an upstream end and a downstream end; a wall defining at least a portion of the boundary of a cavity containing a liquid; said wall comprising a plurality of channel defining surfaces disposed within the wall to define a plurality of channels extending through the wall between the upstream end and the downstream end of the liquid delivery element, wherein each of the plurality of channels has a maximum depth extending in the radial direction and a maximum width extending in the circumferential direction, and wherein the ratio of the maximum depth to the maximum width is between 0.5 to 1 and 2 to 1, and wherein the liquid delivery element further comprises a further wall defining at least a further portion of the boundary of the cavity containing the liquid, said further wall comprising a liquid delivery portion configured to deliver the liquid to the at least one segment of filter material when the liquid delivery element is activated; wherein the wall comprising the at least one channel defining surface of the liquid delivery element is distinct from the wall comprising the liquid delivery portion of the liquid delivery element.

The invention will now be further described, by way of example only, with reference to the accompanying drawings in which:

**Claims**

1. An aerosol-generating article having a length extending in a longitudinal direction between upstream and downstream ends of the aerosol-generating article, the aerosol-generating article having a substantially circular cross-sectional shape defining a circumferential direction extending around the longitudinal direction and a radial direction orthogonal to the longitudinal direction and the circumferential direction, the aerosol-generating article comprising an aerosol-generating substrate and a mouthpiece secured to a downstream end of the aerosol-generating substrate, the mouthpiece comprising at least one segment of filter material and a liquid delivery element, the liquid delivery element comprising:

an upstream end and a downstream end;

a wall defining at least a portion of the boundary of a cavity containing a liquid;

said wall comprising a plurality of channel defining surfaces disposed within the wall to define a plurality of channels extending through the wall between the upstream end and the downstream end of the liquid delivery element, wherein each of the plurality of channels has a maximum depth extending in the radial direction and a maximum width extending in the circumferential direction, and wherein the ratio of the maximum depth to the maximum width is between 0.5 to 1 and 2 to 1,

and wherein the liquid delivery element further comprises a further wall defining at least a further portion of the boundary of the cavity containing the liquid, said further wall comprising a liquid delivery portion configured to deliver the liquid to the at least one segment of filter material when the liquid delivery element is activated;

wherein the wall comprising the at least one channel defining surface of the liquid delivery element is distinct from the wall comprising the liquid delivery portion of the liquid delivery element.

2. An aerosol-generating article according to claim 1, wherein the liquid delivery portion comprises a valve transformable between a closed position and an open position in which the liquid is delivered to the at least one segment of filter material when the liquid delivery element is activated.

3. An aerosol-generating article according to claim 2, wherein the valve comprises a deformable portion and a slit within the deformable portion, wherein the slit is transformable from the closed position to the open position when a force is applied to the liquid delivery element to deform the deformable portion.

4. An aerosol-generating article according to claim 3, wherein the slit is transformable from the open position to the closed position when the force is removed from the liquid delivery element.