Claims

1. A system for cleaning a plurality of needles, the system comprising:

a conveyor for conveying a plurality of jigs through a series of stations, each jig arranged to contain at least some of said needles;

said stations including:

a pre-treatment station for the removal of detritus from said needles;

an electronic polishing station;

a post-treatment station for removal of material from the surface of said treated needles;

a cleaning station for cleaning said needles;

a drying station and;

an unloading station for unloading said needles from said jigs.

2. The system according to claim 1, wherein the pre-treatment includes applying high pressure jet spray to said needles.

3. The system according to claim 1 or 2, wherein said jigs are mounted to baskets arranged to engage the conveyor.

4. The system according to any one of claims 1 to 3, wherein the cleaning station is arranged to immerse the needles in an ultra sonic bath.

5. The system according to claims 4, wherein the cleaning station is further arranged to immerse said needles in a detergent bath.

6. The system according to any one of claims 1 to 3, wherein the post-treatment includes immersion in nitric acid bath..

7. A method of cleaning a plurality of needles, the method comprising the steps of:
conveying a plurality of jigs through a series of stations, each jig arranged to contain at least some of said needles;
pre-treating the needles for the removal of detritus;
electro-polishing the needles;
post-treating the needles to remove material from the surface of said treated needles;
cleaning said needles and;
drying the needles.

8. The method according to claim 7, wherein the drying step comprises:
blow drying and;
oven drying said needles.

~~9. A jig for containing a plurality of needles during a washing procedure, said jig comprising:~~
~~a containment into which the needles are placed, and;~~

~~a cap placed on said containment for preventing floating of the needles.~~

~~10. The jig according to claim 9, wherein the cap and containment are arranged so as to apply a known compression for a pre-determined number of needles within said jig.~~