BGP HEALTHCARE PVT. LTD.

CERTIFICATE OF ANALYSIS

| Product Name | : Nicotine USP | Item code | : FP101-00 |
|--------------|----------------|-------------|------------|
| Batch No. | : NI009/13 | Mfg. Date | : 04/2013 |
| Batch size | : 300.0 Kg. | Retest Date | : 04/2018 |
| CAS No. | : 54-11-5 | | 1 1004 |

| Sr. No. | Tests | Specifications | Results |
|------------|---|--|--------------------------|
| 1. | Description | Colorless to brownish viscous liquid | Colorless viscous liquid |
| 2. | Identification by U.V. U.V.absorption spectrum of the test solution and the standard solution exhibits maxima and minima at the same wavelength. | | Complies |
| ئ. | Specific Optical Rotation at 25°C ±0.5°C | Between -130° and -143° | -135° |
| 4. | Water content | Not more than 0.5 % w/w | 0.1 %w/w |
| 5. | Heavy Metals | Not more than 0.002 % | Complies |
| 6. | Related Substances By HPLC | | |
| \$ | Specified Impurities | | |
| | Anatabine | Not more than 0.30 % | ≤ 0.0067 % |
| | β- Nicotyrine | Not more than 0.30 % | ≤ 0.0304 % |
| | Cotinine | Not more than 0.30 % | ≤ 0.0035 % |
| | Myosmine | Not more than 0.30 % | ≤ 0.0018 % |
| | Nicotine N'oxide | Not more than 0.30 % | ≤ 0.0019 % |
| pos. | Nornicotine | Not more than 0.30 % | ≤ 0.0307 % |
| | Anabasine | Not more than 0.30 % | ≤ 0.0044 % |
| | Any Unspecified Impurities(Single greatest) | Not more than 0.10% | Not detected |
| | Sum of Impurities (Identified & Unidentified) | Not more than 0.80 % | Not detected |
| 7. | Assay by Potentiometer on anhydrous basis | Not less than 99.0 % and not more than 101.0 % | 100.1 % |
| Addit | ional Tests | | |
| 8.* | Total Viable Count | | |
| | a) Total Bacterial Count | NMT 2000 cfu/gm | Not Applicable |
| | b)Total Fungal Count | NMT 200 cfu/gm | |

BGP HEALTHCARE PVT. LTD.

CERTIFICATE OF ANALYSIS

| Product Name | : Nicotine USP | Item code | : FP101-00 |
|--------------|----------------|-------------|------------|
| Batch No. | : N1009/13 | Mfg. Date | : 04/2013 |
| Batch size | : 300.0 Kg. | Retest Date | : 04/2018 |
| CAS No. | : 54-11-5 | | |

| Sr. No. | Tests | Specifications | Results |
|------------|--|---|----------------|
| 10.* | Pathogens Test a. E.coli b. Salmonella species c. Pseudomonas aeruginosa d. S.aureus e. Bile Tolerant Gram Negative Bacteria f. Candida albicans | a. Should be absent b. Should be absent c. Should be absent d. Should be absent e. Should be absent f. Should be absent | Not Applicable |

^{*} Additional tests to be performed for once in five batches.

Batch Complies with respect to above Specifications.

Released By:

Mrs.Sonal Shah Quality Assurance

Released On: 29/04/2013

^{\$} Test carried out as per EP which meets USP requirements as well.