Table 2. Arsenic speciation results.

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Sample | As Source | total As (mg kg-1) | **Mouse RBA** | **Swine RBA** | Arsenopyrite | arseniosiderite | Ferric arsenate (scorodite, kankite) | Am. ferric arsenate | As(V) coppt jarosite | As(V) coppt calcite | As(III) adsorbed | As(V) adsorbed | R-factor |
| 33 | Au mining | 302 | 8.55 | 23.7 |  |  |  |  |  |  | 7 | 93 | 0.060 |
| 37 | Au mining | 370 | 9.83 | 11.7 |  |  |  | 54 | 30 |  |  | 16 | 0.084 |
| 35 | Au mining | 633 | 16.1 | 19.2 |  |  |  |  | 46 |  |  | 54 | 0.046 |
| 34 | Au mining | 2541 | 6.37 | 15.3 |  |  |  | 38 | 42 |  |  | 20 | 0.029 |
| 36 | Au mining | 10482 |  | 4 | 70 |  |  |  |  |  |  | 30 | 0.158 |
| 38 | Au mining | 12041 |  | 23 | 19 |  | 24 |  |  |  |  | 56 | 0.026 |
| 30 | Glass Works | 3996 |  | 26 |  |  |  | 36 |  | 41 |  | 23 | 0.167 |
| 29 | Glass Works | 4553 |  | 48 |  |  |  | 63 |  |  |  | 37 | 0.057 |
| 11 | Mining | 249 | 44.8 | 60 |  |  |  |  | 75 |  |  | 25 | 0.026 |
| 6 | Mining | 839 |  | 41.7 |  |  |  |  | 42 |  | 12 | 46 | 0.032 |
| 12 | Mining | 1236 |  | 39.7 |  |  | 63 |  |  |  | 13 | 24 | 0.137 |
| 10 | Mining | 3913 | 12.9 | 19 |  |  | 64 |  |  |  | 15 | 21 | 0.012 |
| 13 | Mining | 12483 |  | 7.87 |  |  |  | 63 | 37 |  |  | 0 | 0.147 |
| 3 | Pesticide | 222 | 43.5 |  |  |  |  |  |  |  |  | 100 | 0.110 |
| 18 | Pesticide | 283 | 30 | 31 |  |  |  |  |  |  |  | 100 | 0.114 |
| 7 | Pesticide | 332 | 34 | 54.3 |  | 54 |  |  |  | 32 |  | 14 | 0.020 |
| 19 | Pesticide | 353 | 46.1 | 41 |  |  |  |  |  |  |  | 100 | 0.105 |
| 21 | Pesticide | 375 | 39.4 | 53 |  |  |  |  |  |  |  | 100 | 0.329 |
| 20 | Pesticide | 391 | 21.5 | 49 |  |  |  |  |  |  |  | 100 | 0.259 |
| 1 | Pesticide | 464 | 20.2 |  |  |  |  |  |  |  | 90 | 10 | 0.418 |
| 2 | Pesticide | 641 | 29.1 | 39.5 |  |  |  |  |  | 47 |  | 53 | 0.037 |
| 8 | Smelter | 162 | 29.9 | 54.9 |  |  |  |  | 47 |  | 41 | 12 | 0.063 |
| 16 | Spiked | 226 | 81.2 |  |  | 30 |  | 14 |  |  |  | 56 | 0.093 |
| 14 | Spiked | 238 | 79.7 |  |  |  |  | 52 |  |  |  | 48 | 0.072 |
| 15 | Spiked | 259 | 69.7 |  |  |  |  | 66 |  |  |  | 34 | 0.149 |
| 17 | SRM | 1540 | 41.4 | 41.8 |  |  | 23 | 26 | 51 |  |  | 0 | 0.040 |
| 9 | Tailings | 521 |  | 14 |  | 32 | 39 |  |  |  |  | 29 | 0.062 |