

| | | | |
|-------------------------|-----------------------|------------------------|--------------|
| Identificación Informe: | NZCAMP202102PM | Fecha emisión Informe: | MARZO |
|-------------------------|-----------------------|------------------------|--------------|

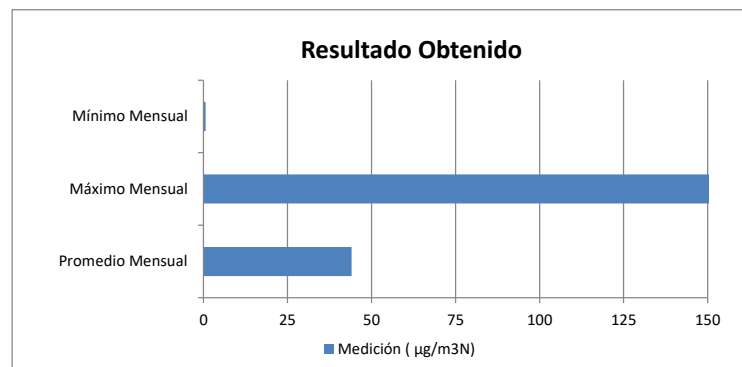
| | |
|----------------------|-----------------------------------|
| Ensayo: | Medición de PM10 continuo |
| Período de Ensayo: | 1 al 28 de Febrero de 2021 |
| Principio Utilizado: | Microbalanza Oscilante |
| Procedimiento: | PGC-SCA-008 |

| | | |
|--------------------------------|--------------------------------------|--|
| Nombre del Laboratorio: | SERPRAM S.A | Los Alerces N° 2742, Nuñoa. |
| Lugar donde se realiza Ensayo: | Minera Gold Fields Salares Norte SpA | Cordillera Copiapó, III Región |
| Cliente: | Gold Fields | Av. Presidente Riesco 5561, Piso 7, Las Condes, Santiago |

| Datos Del Analizador | |
|-------------------------|--------------------------------------|
| Marca: | Turkey |
| Modelo: | Topas TNT 1683 |
| Serie / ID: | - |
| Unidad de Medida: | ($\mu\text{g}/\text{m}^3\text{N}$) |
| Unidad de Notificación: | ($\mu\text{g}/\text{m}^3\text{N}$) |

| Resultado Obtenido | |
|--------------------|--|
| | Medición ($\mu\text{g}/\text{m}^3\text{N}$) |
| Promedio Mensual | 44 |
| Máximo Mensual | 995 |
| Mínimo Mensual | 1 |

| Marco Legal | | | |
|----------------------------|------------|----------------------------------|--------|
| Tipo norma: | Primaria | | |
| Referencia Normativa: | D.S. N° 59 | | |
| Límite Máximo Permissible: | 150 | $\mu\text{g}/\text{m}^3\text{N}$ | Diario |
| | 50 | $\mu\text{g}/\text{m}^3\text{N}$ | Anual |



| Información Adicional |
|-----------------------|
| |

Nataly Zapata
Ingeniero

ESTACIÓN: CAMPAMENTO

VARIABLE : MATERIAL PARTICULADO PM10

UNIDAD : ($\mu\text{g}/\text{m}^3\text{N}$)

AÑO: 2021

MES : FEBRERO

| DÍA | HORAS | | | | | | | | | | | | | | | | | | | | | | | MED | MÁX | MÍN | |
|-----|-------|-----|-----|-----|-----|-----|-----|-----|-----|----|----|----|----|----|----|----|----|----|----|----|-----|-----|-----|-----|-------|-----|----|
| | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 | 21 | 22 | | | | 23 |
| 1 | 24 | 17 | 30 | 43 | 23 | 138 | 257 | 242 | 1 | 1 | 2 | 3 | 3 | 9 | 5 | 2 | 1 | 1 | 3 | 2 | 1 | 1 | 2 | 2 | 34 | 257 | 1 |
| 2 | 2 | 1 | 1 | 3 | 2 | 5 | 2 | 15 | 1 | 1 | 1 | 1 | 2 | 2 | 3 | 3 | 4 | 2 | 2 | 2 | 8 | 9 | 3 | 5 | 3 | 15 | 1 |
| 3 | 3 | 3 | 1 | 1 | 1 | 5 | 349 | 356 | 9 | 1 | 4 | 8 | 2 | 4 | 2 | 6 | 25 | 14 | 14 | 4 | 11 | 239 | 116 | 95 | 53 | 356 | 1 |
| 4 | 50 | 50 | 132 | 38 | 161 | 154 | 780 | 432 | 69 | 6 | 4 | 15 | 15 | 23 | 15 | 12 | 14 | 8 | 7 | 14 | 56 | 70 | 54 | 150 | 97 | 780 | 4 |
| 5 | 106 | 127 | 141 | 130 | 308 | 307 | 316 | 238 | 41 | 7 | 6 | 10 | 10 | 21 | 11 | 10 | 14 | 6 | 4 | 43 | 19 | 50 | 90 | 89 | 88 | 316 | 4 |
| 6 | 34 | 47 | 64 | 185 | 133 | 212 | 437 | 117 | 47 | 5 | 6 | 5 | 16 | 20 | 19 | 16 | 7 | 5 | 8 | 5 | 4 | 8 | 43 | 78 | 63 | 437 | 4 |
| 7 | 87 | 69 | 88 | 32 | 52 | 178 | 339 | 137 | 38 | 8 | 2 | 5 | 12 | 14 | 23 | 14 | 11 | 6 | 6 | 12 | 6 | 19 | 56 | 95 | 55 | 339 | 2 |
| 8 | 55 | 55 | 54 | 95 | 92 | 56 | 187 | 81 | 19 | 10 | 6 | 8 | 8 | 17 | 13 | 17 | 10 | 4 | 4 | 10 | 17 | 13 | 18 | 12 | 36 | 187 | 4 |
| 9 | 15 | 16 | 64 | 22 | 17 | 65 | 88 | 34 | 7 | 3 | 3 | 4 | 8 | 29 | 9 | 8 | 7 | 4 | 4 | 7 | 6 | 6 | 8 | 17 | 19 | 88 | 3 |
| 10 | 11 | 15 | 10 | 13 | 19 | 25 | 40 | 21 | 4 | 11 | 2 | 3 | 10 | 8 | 8 | 25 | 19 | 10 | 24 | 6 | 27 | 5 | 16 | 10 | 14 | 40 | 2 |
| 11 | 7 | 7 | 11 | 18 | 16 | 25 | 56 | 29 | 8 | 3 | 4 | 10 | 13 | 18 | 36 | 8 | 7 | 4 | 3 | 6 | 7 | 5 | 23 | 10 | 14 | 56 | 3 |
| 12 | 15 | 7 | 4 | 9 | 7 | 49 | 41 | 24 | 8 | 3 | 1 | 3 | 7 | 4 | 3 | 6 | 8 | 6 | 5 | 10 | 5 | 7 | 9 | 17 | 11 | 49 | 1 |
| 13 | 18 | 20 | 19 | 13 | 11 | 26 | 68 | 33 | 7 | 2 | 1 | 10 | 8 | 3 | 23 | 16 | 7 | 4 | 5 | 31 | 16 | 47 | 32 | 36 | 19 | 68 | 1 |
| 14 | 15 | 10 | 11 | 59 | 27 | 137 | 259 | 160 | 22 | 3 | 2 | 7 | 8 | 10 | 4 | 3 | 8 | 9 | 3 | 4 | 6 | 4 | 11 | 25 | 34 | 259 | 2 |
| 15 | 28 | 13 | 12 | 22 | 25 | 24 | 26 | 9 | 5 | 2 | 2 | 4 | 7 | 7 | 3 | 1 | 5 | 4 | 11 | 4 | 4 | 12 | 9 | 30 | 11 | 30 | 1 |
| 16 | 30 | 6 | 39 | 18 | 12 | 100 | 12 | 33 | 14 | 5 | 1 | 6 | 4 | 5 | 2 | 15 | 5 | 4 | 9 | 8 | 8 | 18 | 30 | 15 | 17 | 100 | 1 |
| 17 | 15 | 14 | 10 | 7 | 33 | 47 | 68 | 38 | 14 | 5 | 3 | 4 | 9 | 12 | 17 | 13 | 6 | 5 | 6 | 5 | 7 | 24 | 57 | 38 | 19 | 68 | 3 |
| 18 | 37 | 25 | 50 | 22 | 26 | 129 | 86 | 66 | 31 | 8 | 2 | 3 | 8 | 5 | 6 | 9 | 5 | 3 | 3 | 4 | 4 | 10 | 11 | 14 | 24 | 129 | 2 |
| 19 | 16 | 14 | 24 | 45 | 33 | 46 | 135 | 45 | 17 | 20 | 2 | 1 | 13 | 11 | 38 | 8 | 6 | 5 | 6 | 12 | 6 | 10 | 48 | 123 | 29 | 135 | 1 |
| 20 | 102 | 95 | 122 | 95 | 53 | 153 | 464 | 495 | 34 | 10 | 2 | 5 | 4 | 3 | 5 | 5 | 7 | 6 | 5 | 6 | 6 | 23 | 43 | 37 | 74 | 495 | 2 |
| 21 | 38 | 21 | 8 | 31 | 12 | 175 | 422 | 341 | 86 | 17 | 8 | 3 | 8 | 7 | 18 | 12 | 6 | 8 | 12 | 24 | 64 | 144 | 37 | 26 | 64 | 422 | 3 |
| 22 | 21 | 51 | 23 | 27 | 24 | 129 | 459 | 310 | 126 | 15 | 4 | 8 | 11 | 26 | 26 | 17 | 8 | 9 | 5 | 6 | 41 | 77 | 79 | 52 | 65 | 459 | 4 |
| 23 | 37 | 20 | 15 | 25 | 11 | 204 | 644 | 587 | 119 | 12 | 5 | 6 | 10 | 17 | 19 | 26 | 11 | 7 | 13 | 24 | 40 | 129 | 62 | 65 | 88 | 644 | 5 |
| 24 | 91 | 72 | 34 | 42 | 41 | 530 | 995 | 410 | 144 | 10 | 7 | 7 | 6 | 14 | 31 | 14 | 34 | 13 | 7 | 29 | 119 | 84 | 33 | 30 | 117 | 995 | 6 |
| 25 | 36 | 22 | 19 | 36 | 46 | 146 | 791 | 480 | 177 | 13 | 9 | 4 | 9 | 27 | 21 | 16 | 15 | 3 | 6 | 26 | 58 | 29 | 39 | 18 | 85 | 791 | 3 |
| 26 | 13 | 26 | 8 | 16 | 22 | 163 | 370 | 200 | 35 | 9 | 5 | 7 | 20 | 16 | 21 | 14 | 12 | 7 | 10 | 19 | 66 | 31 | 32 | 22 | 48 | 370 | 5 |
| 27 | 7 | 7 | 6 | 10 | 5 | 2 | 2 | 2 | 2 | 5 | 5 | 5 | 22 | 17 | 20 | 27 | 5 | 5 | 12 | 28 | 24 | 31 | 47 | 38 | 14 | 47 | 2 |
| 28 | 26 | 12 | 18 | 18 | 13 | 163 | 283 | 150 | 12 | 4 | 6 | 4 | 12 | 13 | 35 | 23 | 11 | 10 | 9 | 28 | 39 | 13 | 90 | 41 | 43 | 283 | 4 |
| MED | 34 | 30 | 36 | 39 | 44 | 121 | 285 | 182 | 39 | 7 | 4 | 6 | 9 | 13 | 16 | 12 | 10 | 6 | 7 | 14 | 24 | 40 | 39 | 42 | 44 | 293 | 3 |
| MÁX | 106 | 127 | 141 | 185 | 308 | 530 | 995 | 587 | 177 | 20 | 9 | 15 | 22 | 29 | 38 | 27 | 34 | 14 | 24 | 43 | 119 | 239 | 116 | 150 | EXTR. | 995 | 1 |
| MÍN | 2 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 1 | 1 | 1 | 1 | 2 | 2 | 2 | 1 | 1 | 1 | 2 | 2 | 1 | 1 | 2 | 2 | | | |

Nº DE DATOS VÁLIDOS :

672

RECUPERACIÓN DE DATOS :

100 %

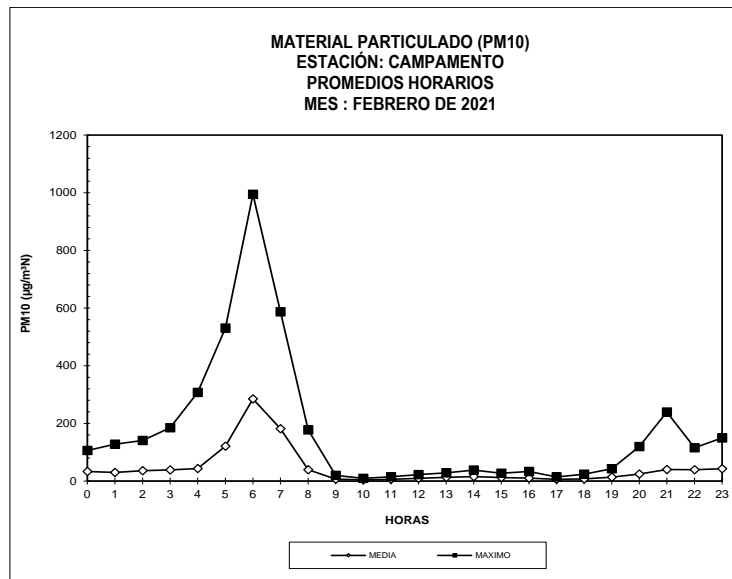
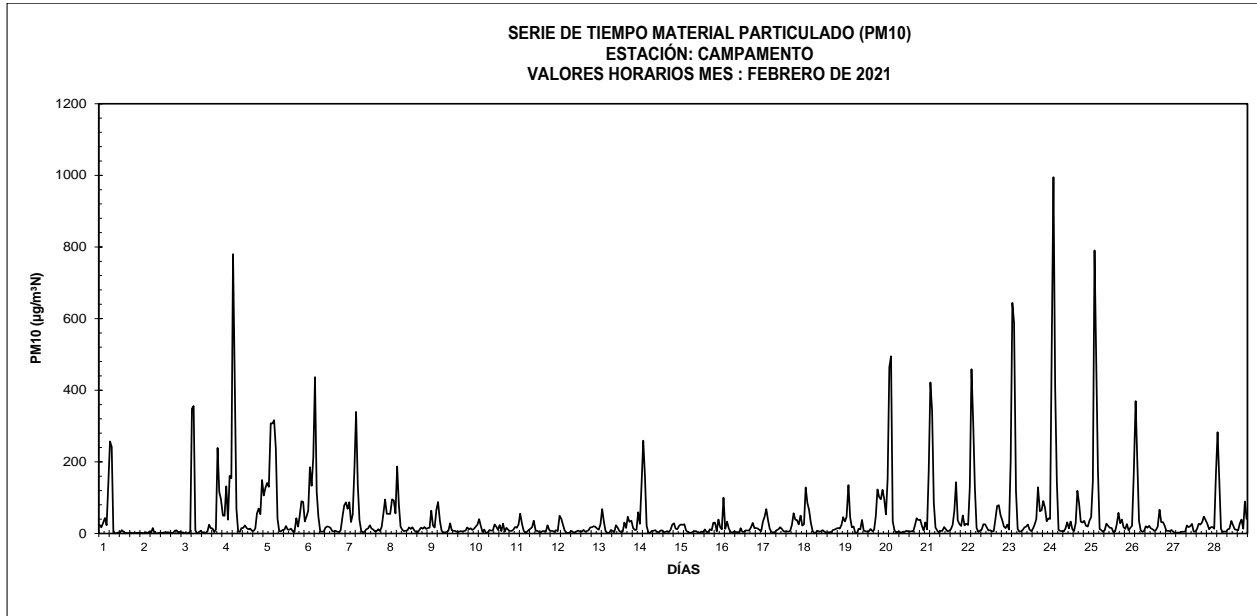
Nº MÍNIMO DE OBSERVACIONES PARA CALCULAR VALORES DIARIOS :

18 horas

Nº MÍNIMO DE OBSERVACIONES PARA CALCULAR VALORES MENSUALES :

23 días

CÓDIGO DE AUSENCIA DE DATOS SEGÚN DECRETO Nº 61



| | | | |
|-------------------------|-----------------------|------------------------|--------------|
| Identificación Informe: | NZCAMP202102P2 | Fecha emisión Informe: | MARZO |
|-------------------------|-----------------------|------------------------|--------------|

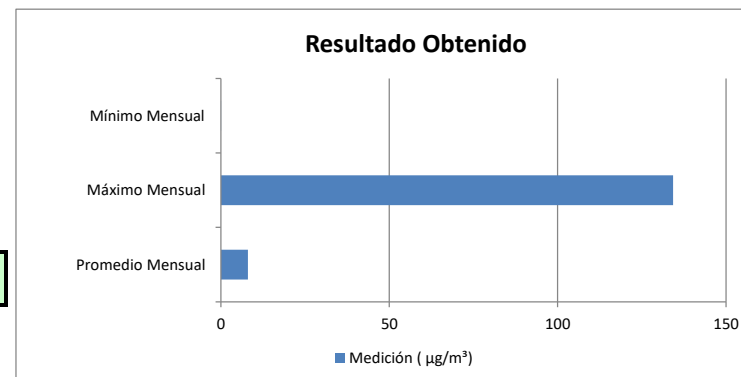
| | |
|----------------------|-----------------------------------|
| Ensayo: | Medición de PM2.5 continuo |
| Período de Ensayo: | 1 al 28 de Febrero de 2021 |
| Principio Utilizado: | Microbalanza Oscilante |
| Procedimiento: | PGC-SCA-003 |

| | | |
|--------------------------------|--------------------------------------|--|
| Nombre del Laboratorio: | SERPRAM S.A | Los Alerces N° 2742, Nuñoa. |
| Lugar donde se realiza Ensayo: | Minera Gold Fields Salares Norte SpA | Cordillera Copiapó, III Región |
| Cliente: | Gold Fields | Av. Presidente Riesco 5561, Piso 7, Las Condes, Santiago |

| Datos Del Analizador | |
|-------------------------|------------------------------|
| Marca: | Turkey |
| Modelo: | Topas TNT 1683 |
| Serie / ID: | - |
| Unidad de Medida: | ($\mu\text{g}/\text{m}^3$) |
| Unidad de Notificación: | ($\mu\text{g}/\text{m}^3$) |

| Resultado Obtenido | |
|--------------------|---|
| | Medición ($\mu\text{g}/\text{m}^3$) |
| Promedio Mensual | 8 |
| Máximo Mensual | 134 |
| Mínimo Mensual | 0 |

| Marco Legal | | | |
|----------------------------|------------|--------------------------|--------|
| Tipo norma: | Primaria | | |
| Referencia Normativa: | D.S. N° 12 | | |
| Límite Máximo Permissible: | 50 | $\mu\text{g}/\text{m}^3$ | Diario |
| | 20 | $\mu\text{g}/\text{m}^3$ | Anual |



| Información Adicional |
|-----------------------|
| |

Nataly Zapata
Ingeniero

"No se debe reproducir este Informe total o parcialmente sin aprobación escrita del Laboratorio"

ESTACIÓN: CAMPAMENTO

VARIABLE : MATERIAL PARTICULADO PM2.5

UNIDAD : (µg/m³)

AÑO: 2021

MES : FEBRERO

| DÍA | HORAS | | | | | | | | | | | | | | | | | | | | | | | MED | MÁX | MÍN | | |
|------------|-------|----|----|----|----|----|-----|-----|----|---|----|----|----|----|----|----|----|----|----|----|----|----|----|-----|-------|-----|----|---|
| | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 | 21 | 22 | | | | 23 | |
| 1 | 4 | 2 | 5 | 8 | 3 | 21 | 44 | 42 | 0 | 0 | 0 | 1 | 1 | 2 | 1 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 6 | 44 | 0 | |
| 2 | 1 | 0 | 0 | 1 | 0 | 1 | 0 | 4 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | 1 | 1 | 0 | 0 | 0 | 0 | 2 | 2 | 1 | 1 | 1 | 4 | 0 |
| 3 | 1 | 0 | 0 | 0 | 0 | 1 | 52 | 59 | 2 | 0 | 1 | 1 | 1 | 1 | 0 | 1 | 6 | 4 | 3 | 1 | 3 | 37 | 22 | 20 | 9 | 59 | 0 | |
| 4 | 11 | 12 | 24 | 8 | 33 | 28 | 117 | 75 | 12 | 1 | 1 | 3 | 3 | 5 | 3 | 2 | 3 | 2 | 2 | 2 | 8 | 13 | 11 | 33 | 17 | 117 | 1 | |
| 5 | 25 | 31 | 34 | 32 | 61 | 54 | 52 | 42 | 8 | 2 | 1 | 2 | 2 | 5 | 2 | 2 | 3 | 1 | 1 | 9 | 4 | 8 | 17 | 17 | 17 | 61 | 1 | |
| 6 | 8 | 11 | 15 | 40 | 31 | 36 | 66 | 19 | 8 | 1 | 1 | 1 | 3 | 3 | 4 | 3 | 2 | 1 | 2 | 1 | 1 | 2 | 9 | 15 | 12 | 66 | 1 | |
| 7 | 17 | 15 | 18 | 7 | 9 | 30 | 57 | 25 | 7 | 1 | 0 | 1 | 2 | 3 | 5 | 3 | 2 | 1 | 1 | 3 | 1 | 4 | 10 | 18 | 10 | 57 | 0 | |
| 8 | 11 | 12 | 12 | 20 | 20 | 13 | 36 | 15 | 3 | 2 | 1 | 1 | 2 | 4 | 3 | 4 | 2 | 1 | 1 | 3 | 3 | 3 | 4 | 3 | 7 | 36 | 1 | |
| 9 | 3 | 3 | 15 | 5 | 3 | 10 | 13 | 6 | 2 | 1 | 1 | 1 | 2 | 6 | 2 | 2 | 2 | 1 | 1 | 2 | 2 | 2 | 3 | 4 | 4 | 15 | 1 | |
| 10 | 3 | 3 | 2 | 3 | 4 | 4 | 6 | 4 | 1 | 2 | 0 | 1 | 2 | 2 | 2 | 4 | 5 | 3 | 7 | 2 | 5 | 1 | 3 | 2 | 3 | 7 | 0 | |
| 11 | 2 | 2 | 2 | 4 | 4 | 4 | 9 | 5 | 1 | 1 | 1 | 2 | 2 | 3 | 9 | 2 | 1 | 1 | 1 | 2 | 2 | 1 | 4 | 2 | 3 | 9 | 1 | |
| 12 | 3 | 1 | 1 | 2 | 1 | 6 | 6 | 4 | 2 | 1 | 0 | 1 | 1 | 1 | 1 | 1 | 2 | 1 | 1 | 3 | 1 | 2 | 2 | 4 | 2 | 6 | 0 | |
| 13 | 4 | 4 | 4 | 3 | 2 | 4 | 10 | 5 | 1 | 0 | 0 | 2 | 2 | 1 | 5 | 4 | 2 | 1 | 1 | 6 | 3 | 6 | 5 | 6 | 3 | 10 | 0 | |
| 14 | 3 | 2 | 2 | 11 | 6 | 20 | 40 | 26 | 4 | 1 | 0 | 2 | 2 | 2 | 1 | 1 | 2 | 2 | 1 | 1 | 2 | 1 | 2 | 4 | 6 | 40 | 0 | |
| 15 | 3 | 3 | 3 | 6 | 6 | 5 | 5 | 2 | 1 | 0 | 0 | 1 | 2 | 2 | 1 | 0 | 1 | 1 | 3 | 1 | 1 | 2 | 2 | 5 | 2 | 6 | 0 | |
| 16 | 5 | 1 | 5 | 3 | 2 | 15 | 2 | 5 | 3 | 1 | 0 | 1 | 1 | 1 | 0 | 4 | 1 | 1 | 2 | 2 | 2 | 3 | 5 | 3 | 3 | 15 | 0 | |
| 17 | 3 | 3 | 2 | 2 | 4 | 8 | 11 | 6 | 3 | 1 | 1 | 1 | 2 | 2 | 5 | 3 | 1 | 1 | 1 | 1 | 2 | 4 | 8 | 7 | 3 | 11 | 1 | |
| 18 | 6 | 6 | 9 | 4 | 5 | 21 | 14 | 10 | 6 | 2 | 0 | 0 | 2 | 1 | 1 | 2 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 3 | 4 | 21 | 0 | |
| 19 | 3 | 3 | 5 | 7 | 6 | 7 | 27 | 8 | 3 | 4 | 0 | 0 | 2 | 2 | 9 | 2 | 1 | 1 | 1 | 3 | 1 | 2 | 9 | 23 | 5 | 27 | 0 | |
| 20 | 21 | 18 | 23 | 21 | 12 | 29 | 83 | 88 | 7 | 2 | 0 | 1 | 1 | 1 | 1 | 1 | 2 | 1 | 1 | 2 | 1 | 4 | 8 | 5 | 14 | 88 | 0 | |
| 21 | 7 | 4 | 2 | 5 | 2 | 27 | 70 | 60 | 17 | 3 | 1 | 1 | 1 | 1 | 3 | 3 | 1 | 1 | 3 | 4 | 9 | 27 | 9 | 6 | 11 | 70 | 1 | |
| 22 | 5 | 9 | 6 | 8 | 6 | 27 | 94 | 59 | 24 | 3 | 1 | 1 | 2 | 4 | 5 | 4 | 2 | 2 | 1 | 2 | 8 | 15 | 15 | 11 | 13 | 94 | 1 | |
| 23 | 8 | 4 | 3 | 5 | 2 | 37 | 111 | 109 | 22 | 2 | 1 | 1 | 2 | 3 | 4 | 6 | 2 | 1 | 2 | 5 | 6 | 22 | 11 | 13 | 16 | 111 | 1 | |
| 24 | 19 | 14 | 6 | 7 | 7 | 70 | 134 | 76 | 25 | 2 | 1 | 1 | 1 | 3 | 7 | 3 | 5 | 3 | 2 | 5 | 19 | 15 | 6 | 6 | 18 | 134 | 1 | |
| 25 | 7 | 4 | 4 | 7 | 10 | 26 | 122 | 78 | 30 | 2 | 2 | 1 | 2 | 6 | 4 | 4 | 4 | 1 | 1 | 5 | 10 | 5 | 8 | 3 | 14 | 122 | 1 | |
| 26 | 3 | 5 | 2 | 4 | 4 | 30 | 73 | 37 | 6 | 2 | 1 | 1 | 3 | 3 | 5 | 3 | 3 | 2 | 2 | 4 | 11 | 5 | 6 | 5 | 9 | 73 | 1 | |
| 27 | 2 | 2 | 1 | 2 | 1 | 0 | 0 | 1 | 1 | 1 | 1 | 1 | 1 | 5 | 4 | 4 | 7 | 1 | 1 | 3 | 6 | 5 | 7 | 9 | 8 | 3 | 9 | 0 |
| 28 | 6 | 3 | 4 | 4 | 3 | 27 | 48 | 26 | 3 | 1 | 1 | 1 | 2 | 3 | 7 | 5 | 2 | 2 | 2 | 5 | 8 | 3 | 16 | 7 | 8 | 48 | 1 | |
| MED | 7 | 6 | 7 | 8 | 9 | 20 | 46 | 32 | 7 | 1 | 1 | 1 | 2 | 3 | 3 | 3 | 2 | 1 | 2 | 3 | 4 | 7 | 7 | 8 | 8 | 49 | 0 | |
| MÁX | 25 | 31 | 34 | 40 | 61 | 70 | 134 | 109 | 30 | 4 | 2 | 3 | 5 | 6 | 9 | 7 | 6 | 4 | 7 | 9 | 19 | 37 | 22 | 33 | EXTR. | 134 | 0 | |
| MÍN | 1 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |

N° DE DATOS VÁLIDOS :

672

RECUPERACIÓN DE DATOS :

100 %

N° MÍNIMO DE OBSERVACIONES PARA CALCULAR VALORES DIARIOS :

18 horas

N° MÍNIMO DE OBSERVACIONES PARA CALCULAR VALORES MENSUALES :

23 días

CÓDIGO DE AUSENCIA DE DATOS SEGÚN DECRETO N° 61

