|  |  |  |  |
| --- | --- | --- | --- |
| ***REGION*** | ***HIV CASES (x)*** | ***x-x̅*** | ***(x-x̅)2*** |
| ASHANTI | 73,245 | 51,517.5625 | 2,654,059,245.9414 |
| GREATER ACCRA | 70,855 | 49,127.5625 | 2,413,517,397.1914 |
| EASTERN | 47,866 | 26,138.5625 | 683,224,449.56641 |
| WESTERN | 25,620 | 3,892.5625 | 15,152,042.816406 |
| CENTRAL | 24,881 | 3,153.5625 | 9,944,956.4414063 |
| VOLTA | 20,949 | -778.4375 | 605,964.94140625 |
| BONO | 19,173 | -2,554.4375 | 6,525,150.9414063 |
| BONO EAST | 14,273 | -7,454.4375 | 55,568,638.441406 |
| WESTERN NORTH | 10,619 | -11,108.4375 | 123,397,383.69141 |
| AHAFO | 8,405 | -13,322.4375 | 177,487,340.94141 |
| UPPER EAST | 7,953 | -13,774.4375 | 189,735,128.44141 |
| NORTHERN | 6,941 | -14,786.4375 | 218,638,733.94141 |
| OTI | 5,877 | -15,850.4375 | 215,236,368.94141 |
| UPPER WEST | 5,725 | -16,002-4375 | 256,078,005.94141 |
| SAVANNAH | 3,135 | -18,592.4375 | 345,678,732.19141 |
| NORTH EAST | 2,122 | -19,605.4375 | 384,373,179.56641 |
| ***TOTAL*** | **347,639** | **-3999.9995** | **7,749,222,719.9374** |

**THE TABLE BELOW SHOWS THE AVERAGE, DEVIATIONS AND CO-EFFICIENT OF VARIATIONS OF HIV/AIDS CASES IN 2021**

Average=$ \frac{Ʃfx}{Ʃf}$ = $\frac{347639}{16}$ =

჻Average= 21,727.4375

Variation (V)= $\frac{Ʃ(x-x̅)2}{N}$ = $\frac{7,749,222,719.9374}{16}$

჻V= 486,326,419.99609

Standard Deviation (S.D) = $\sqrt{\frac{Ʃ(x-x̅)2}{N}}$ = $\sqrt{\frac{7,749,222,719.9374}{16}}$

჻S.D = 22,007.4174

Co=efficient of Variation (C.V) = $\frac{S.D}{M}$x100%, where M is mean or Average

C.V = $\frac{22007.4174}{21727.4375}x100\%$ = 101.3% (rounded to 1 decimal place)