

Predicción IPC para los próximos 5 meses

1 Predicciones

| Año | Mes | República | Región I | Región II | Región III | Región IV | Región V | Región VI | Región VII | Región VIII |
|------|-----------|-----------|----------|-----------|------------|-----------|----------|-----------|------------|-------------|
| 2023 | Diciembre | 168.09 | 142.17 | 247.87 | 159.66 | 236.56 | 154.69 | 153.53 | 227.66 | 170.9 |
| 2024 | Enero | 168.81 | 142.92 | 247.87 | 160.66 | 237.76 | 155.22 | 154.27 | 228.98 | 170.93 |
| 2024 | Febrero | 169.53 | 143.68 | 247.87 | 161.67 | 238.78 | 155.75 | 155.02 | 230.22 | 170.93 |
| 2024 | Marzo | 170.25 | 144.44 | 247.87 | 162.67 | 239.96 | 156.28 | 155.77 | 231.45 | 170.92 |
| 2024 | Abril | 170.97 | 145.2 | 247.87 | 163.67 | 241.17 | 156.81 | 156.51 | 232.69 | 170.92 |

2 Gráficas

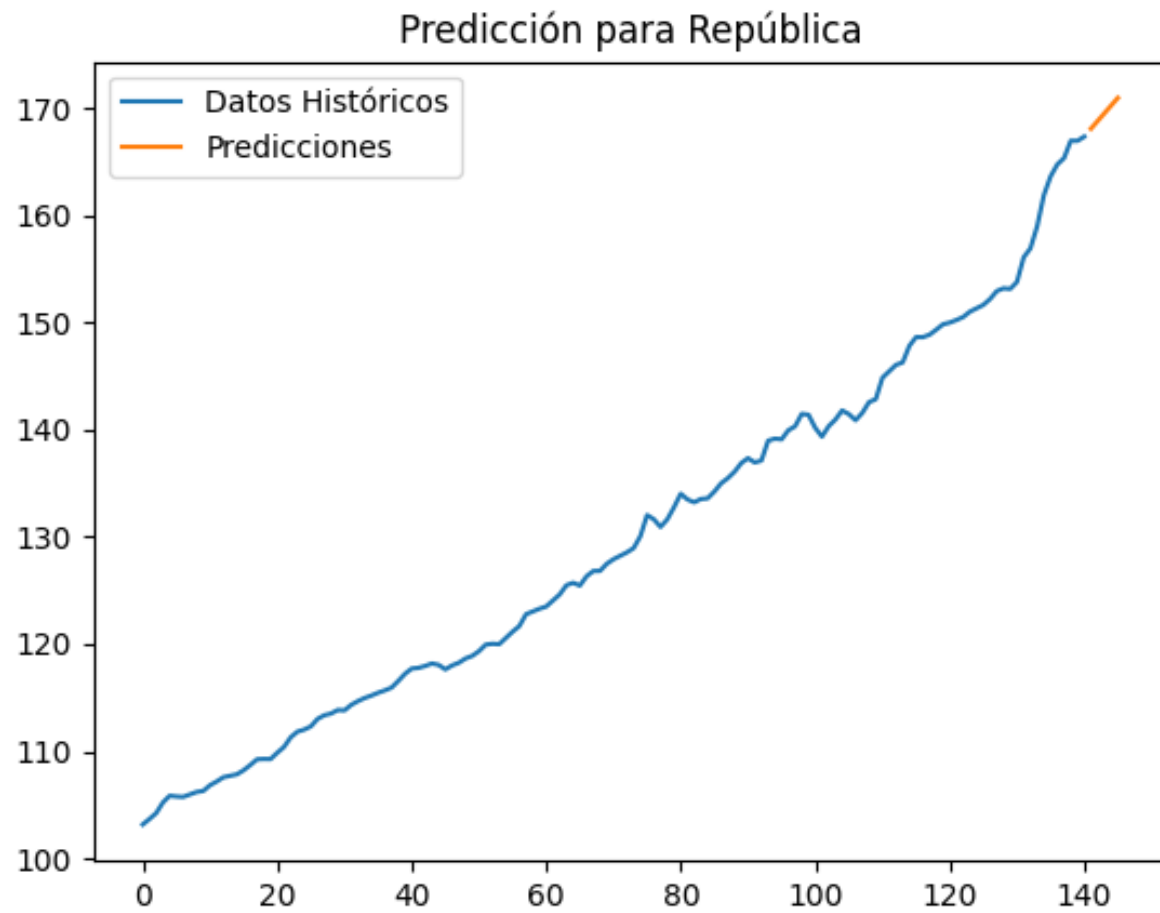


Figure 1: Gráfica de República

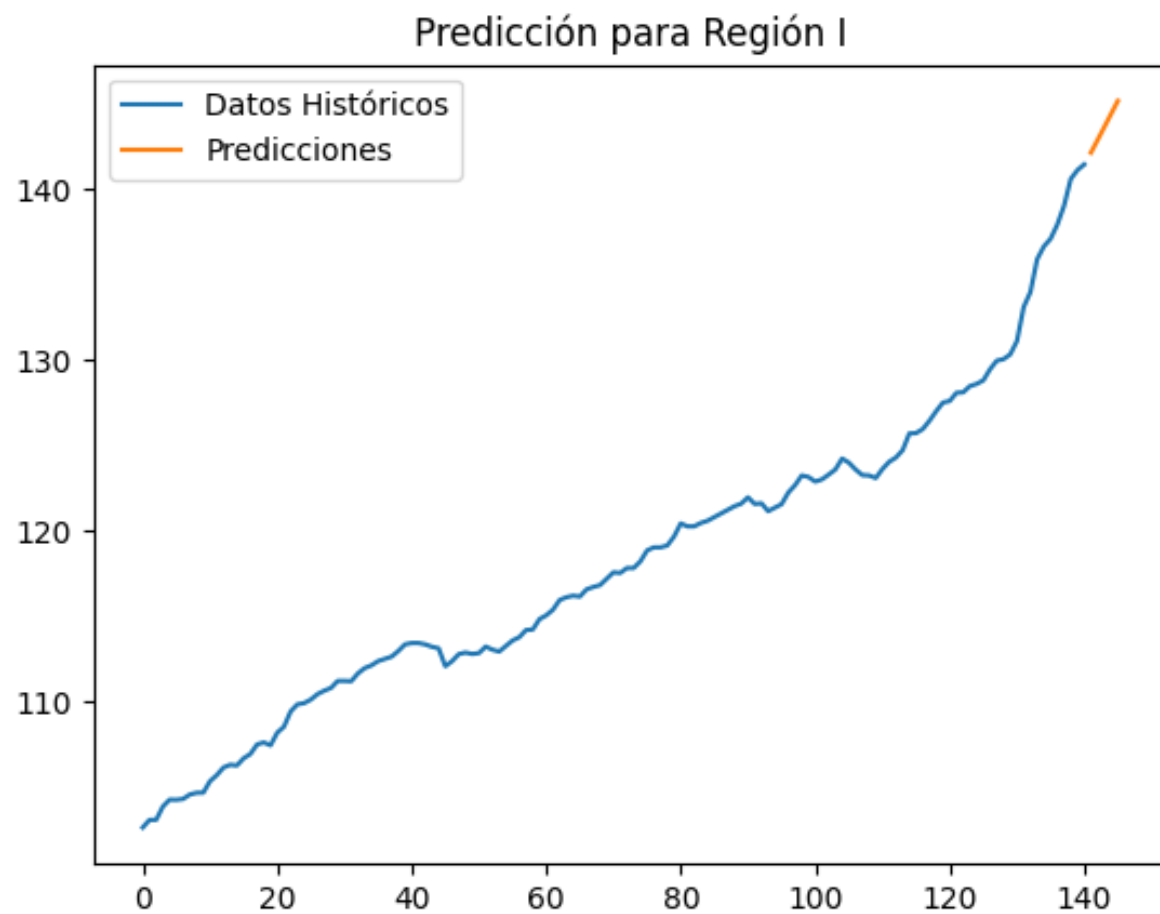


Figure 2: Gráfica de Región I

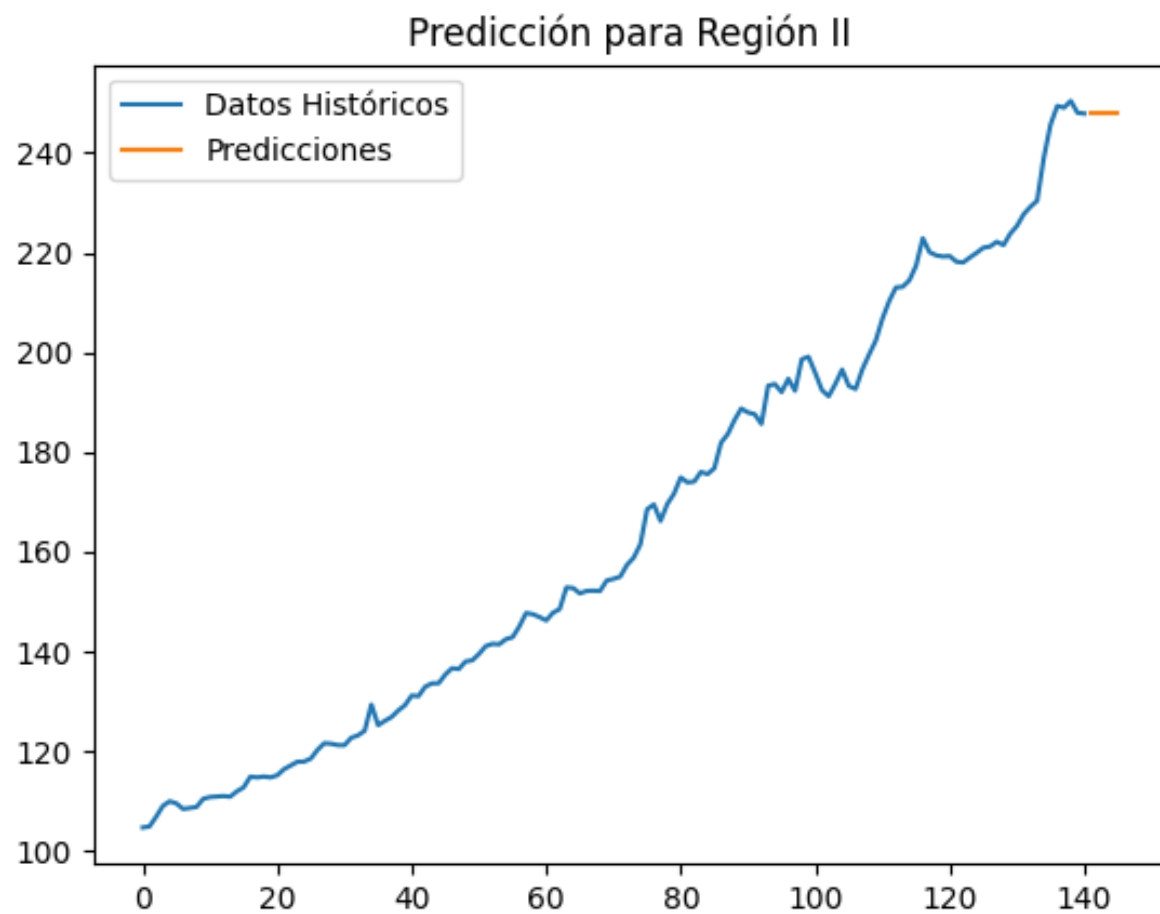


Figure 3: Gráfica de Región II

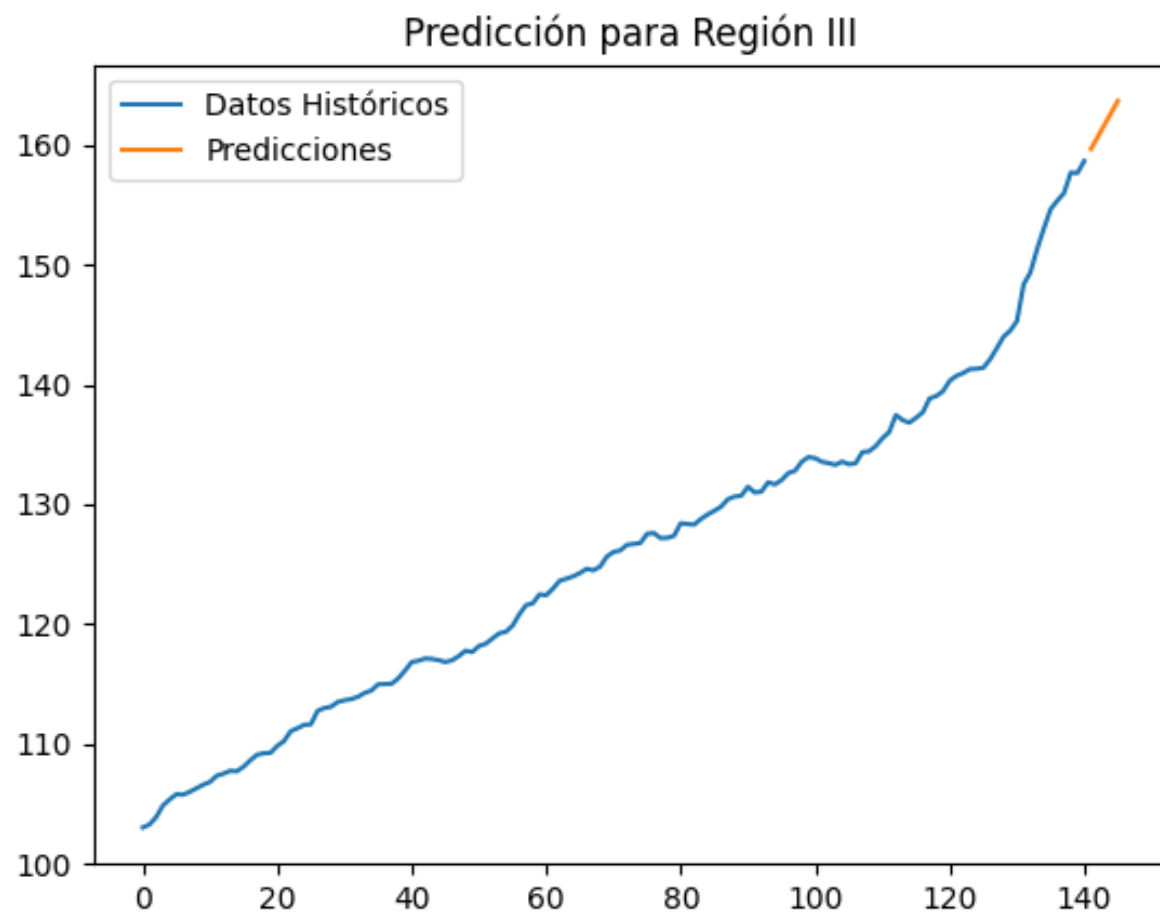


Figure 4: Gráfica de Región III

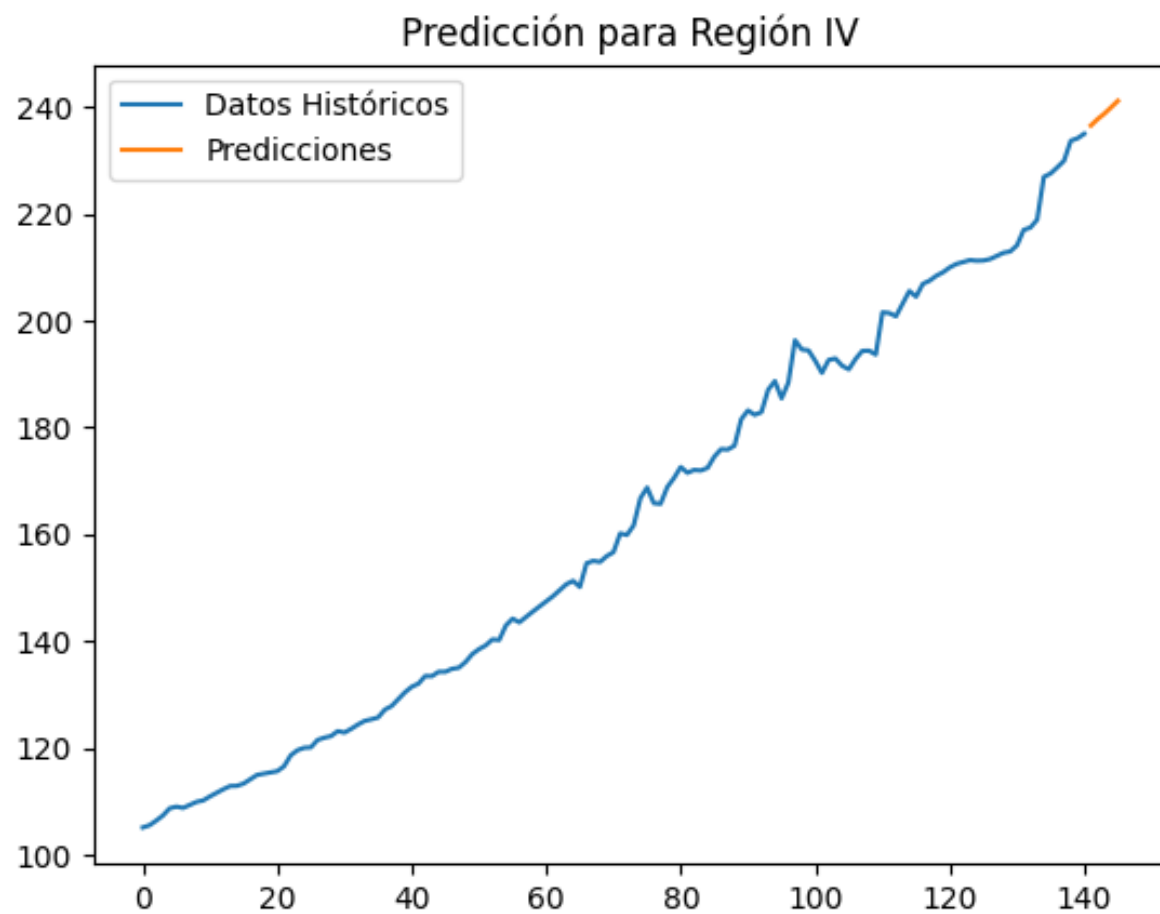


Figure 5: Gráfica de Región IV

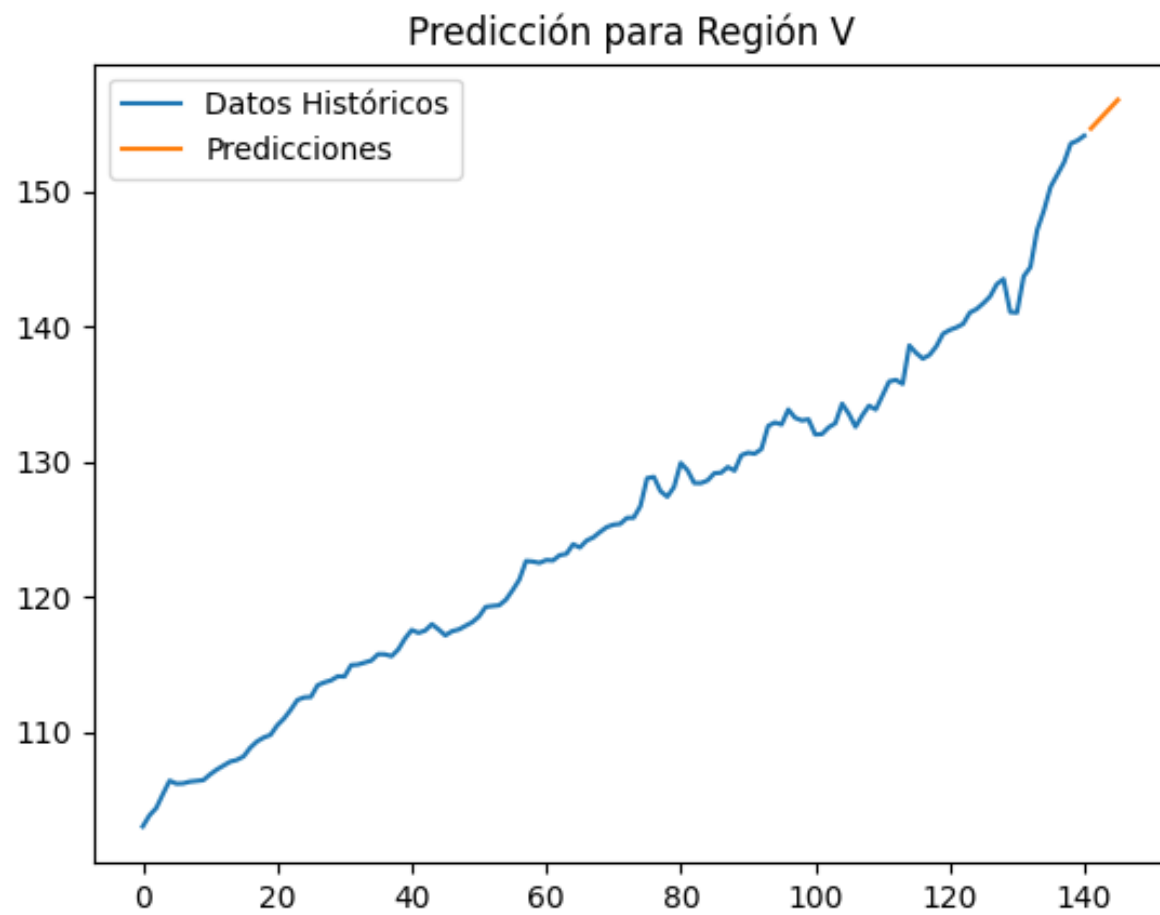


Figure 6: Gráfica de Región V

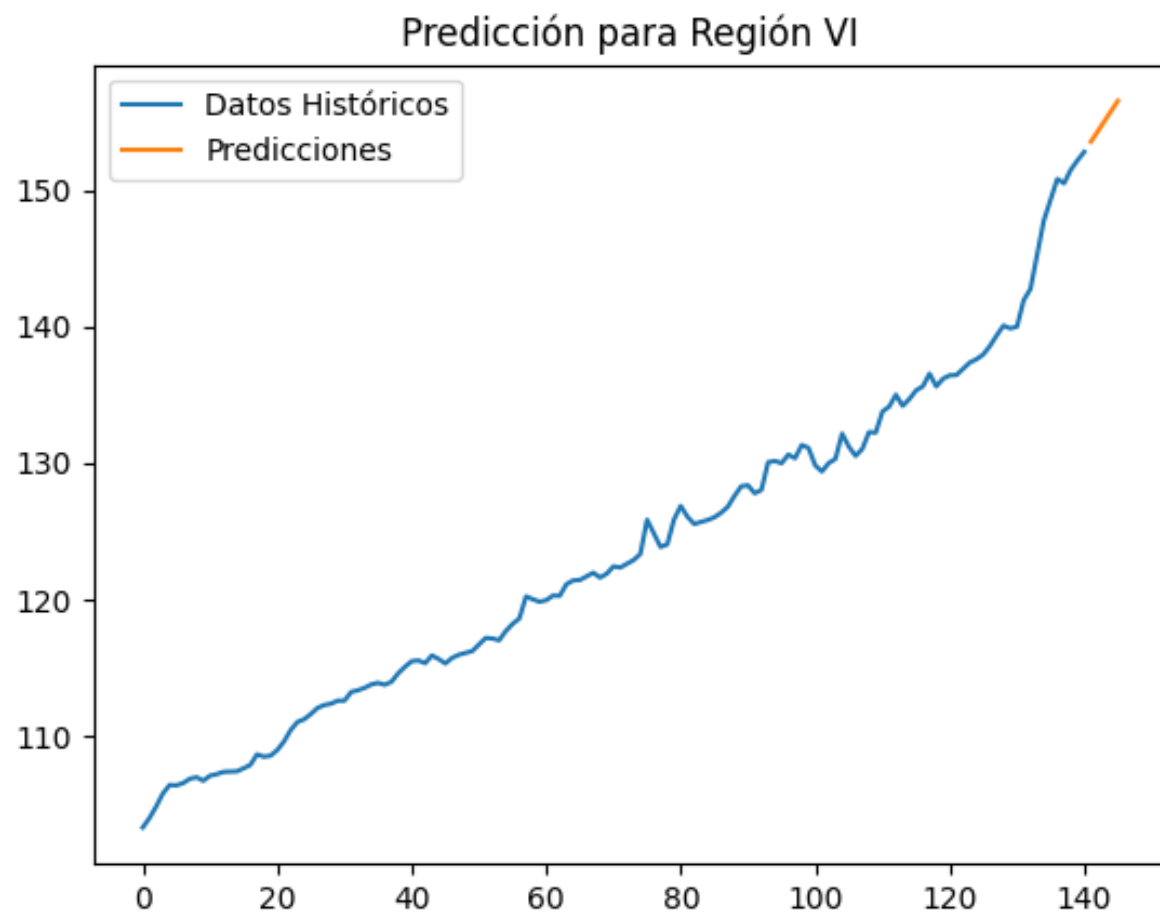


Figure 7: Gráfica de Región VI

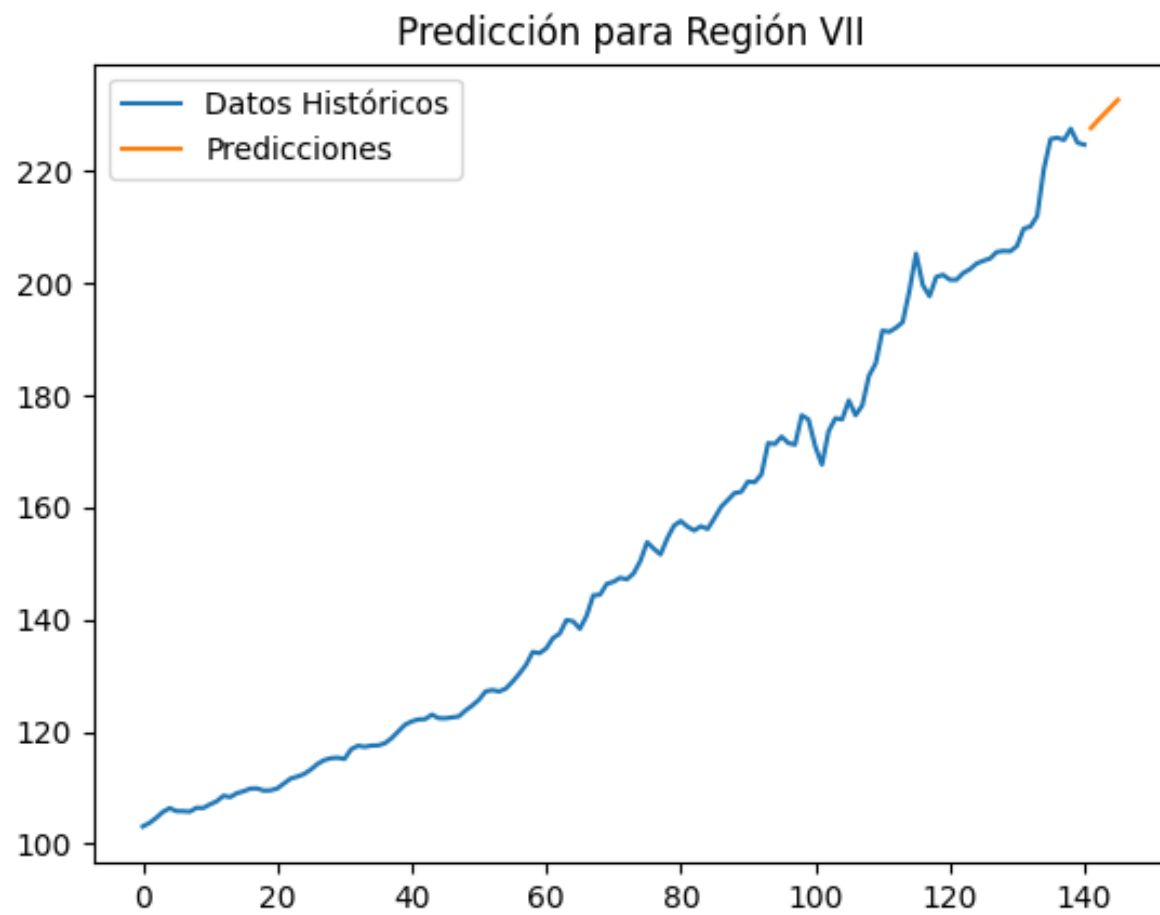


Figure 8: Gráfica de Región VII

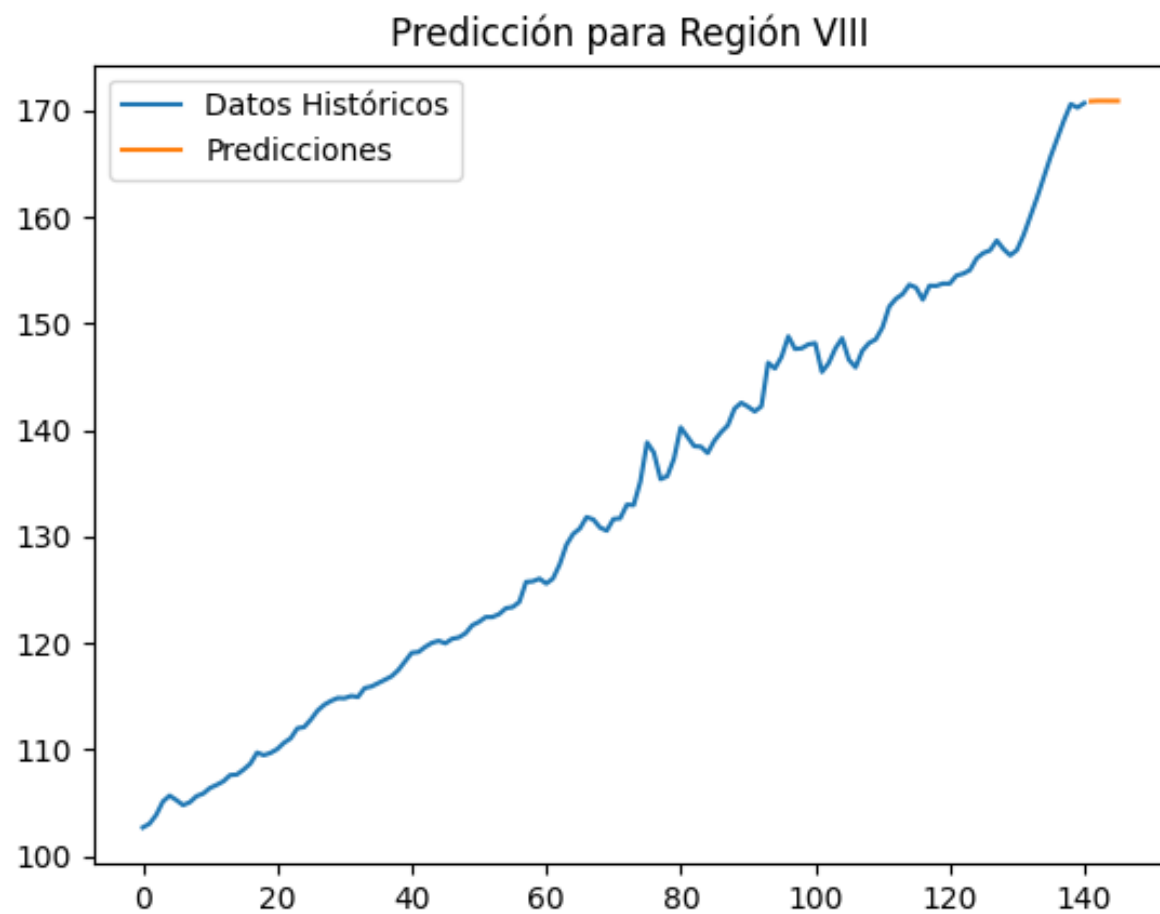


Figure 9: Gráfica de Región VIII

3 Tablas de resumen

República

| | | | | | | | | | | | |
|--------|---------|---------|-------------------------|-------|------------------|--------|--------------------------|------|-------------------|-------|--|
| | | | | | | | | | | | |
| | | | Dep. Variable: | | República | | No. Observations: | | 141 | | |
| | | | Model: | | ARIMA(0, 2, 2) | | Log Likelihood | | -112.529 | | |
| | | | Date: | | Wed, 22 Nov 2023 | | AIC | | 231.058 | | |
| | | | Time: | | 11:46:51 | | BIC | | 239.862 | | |
| | | | Sample: | | 0 | | HQIC | | 234.636 | | |
| | | | | | - 141 | | | | | | |
| | | | Covariance Type: | | opg | | | | | | |
| | | | | | | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.22 | Jarque-Bera (JB): | 35.95 | |
| ma.L1 | -0.5955 | 0.054 | -11.024 | 0.000 | -0.701 | -0.490 | Prob(Q): | 0.64 | Prob(JB): | 0.00 | |
| ma.L2 | -0.3488 | 0.066 | -5.309 | 0.000 | -0.478 | -0.220 | Heteroskedasticity (H): | 8.32 | Skew: | 0.70 | |
| sigma2 | 0.2912 | 0.024 | 11.995 | 0.000 | 0.244 | 0.339 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 5.06 | |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región I

| | | | | | | | | | | |
|--------|---------|-------------------------|---------|------------------|--------|--------------------------|-------------------------|---------|-------------------|-------|
| | | Dep. Variable: | | Región I | | No. Observations: | | 141 | | |
| | | Model: | | ARIMA(1, 2, 1) | | Log Likelihood | | -50.463 | | |
| | | Date: | | Wed, 22 Nov 2023 | | AIC | | 106.926 | | |
| | | Time: | | 11:46:51 | | BIC | | 115.730 | | |
| | | Sample: | | 0 | | HQIC | | 110.504 | | |
| | | | | - 141 | | | | | | |
| | | Covariance Type: | | opg | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.01 | Jarque-Bera (JB): | 66.74 |
| ar.L1 | 0.1670 | 0.114 | 1.466 | 0.143 | -0.056 | 0.390 | Prob(Q): | 0.92 | Prob(JB): | 0.00 |
| ma.L1 | -0.8754 | 0.046 | -19.138 | 0.000 | -0.965 | -0.786 | Heteroskedasticity (H): | 2.01 | Skew: | 0.76 |
| sigma2 | 0.1200 | 0.011 | 11.065 | 0.000 | 0.099 | 0.141 | Prob(H) (two-sided): | 0.02 | Kurtosis: | 6.04 |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región II

| | | | | | | | | | | |
|---------------|-------------|----------------|----------|------------------|---------------|---------------|--------------------------------|------------------|--------------------------|----------|
| | | | | | | | | | | |
| | | | | | | | Dep. Variable: | Región II | No. Observations: | 141 |
| | | | | | | | Model: | ARIMA(0, 1, 0) | Log Likelihood | -315.550 |
| | | | | | | | Date: | Wed, 22 Nov 2023 | AIC | 633.100 |
| | | | | | | | Time: | 11:46:52 | BIC | 636.041 |
| | | | | | | | Sample: | 0 | HQIC | 634.295 |
| | | | | | | | | - 141 | | |
| | | | | | | | Covariance Type: | opg | | |
| | | | | | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 1.52 | Jarque-Bera (JB): | 39.84 |
| | | | | | | | Prob(Q): | 0.22 | Prob(JB): | 0.00 |
| sigma2 | 5.3121 | 0.434 | 12.232 | 0.000 | 4.461 | 6.163 | Heteroskedasticity (H): | 4.17 | Skew: | 0.79 |
| | | | | | | | Prob(H) (two-sided): | 0.00 | Kurtosis: | 5.08 |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región III

| | | | | | | | | | | |
|---------------|-------------|----------------|----------------------------------|------------------|---------------|---------------|--------------------------------|------|--------------------------|--------|
| | | | Dep. Variable: Región III | | | | No. Observations: 141 | | | |
| | | | Model: ARIMA(1, 2, 2) | | | | Log Likelihood -81.421 | | | |
| | | | Date: Wed, 22 Nov 2023 | | | | AIC 170.842 | | | |
| | | | Time: 11:46:52 | | | | BIC 182.580 | | | |
| | | | Sample: 0 | | | | HQIC 175.612 | | | |
| | | | - 141 | | | | | | | |
| | | | Covariance Type: opg | | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.29 | Jarque-Bera (JB): | 250.41 |
| ar.L1 | -0.8515 | 0.091 | -9.401 | 0.000 | -1.029 | -0.674 | Prob(Q): | 0.59 | Prob(JB): | 0.00 |
| ma.L1 | 0.0990 | 0.065 | 1.520 | 0.128 | -0.029 | 0.227 | Heteroskedasticity (H): | 4.45 | Skew: | 1.25 |
| ma.L2 | -0.8021 | 0.065 | -12.354 | 0.000 | -0.929 | -0.675 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 9.08 |
| sigma2 | 0.1870 | 0.013 | 14.447 | 0.000 | 0.162 | 0.212 | | | | |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región IV

| | | | | | | | | | | |
|--------|---------|---------|---------------------------------|-------|--------|--------|--------------------------------|-------|--------------------------|--------|
| | | | Dep. Variable: Región IV | | | | No. Observations: 141 | | | |
| | | | Model: ARIMA(3, 1, 2) | | | | Log Likelihood -260.319 | | | |
| | | | Date: Wed, 22 Nov 2023 | | | | AIC 532.638 | | | |
| | | | Time: 11:46:52 | | | | BIC 550.287 | | | |
| | | | Sample: 0 | | | | HQIC 539.810 | | | |
| | | | - 141 | | | | | | | |
| | | | Covariance Type: opg | | | | | | | |
| | | | | | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | | | | |
| ar.L1 | 0.7888 | 0.186 | 4.232 | 0.000 | 0.423 | 1.154 | Ljung-Box (L1) (Q): | 0.02 | Jarque-Bera (JB): | 214.32 |
| ar.L2 | -0.1427 | 0.192 | -0.745 | 0.456 | -0.518 | 0.233 | Prob(Q): | 0.88 | Prob(JB): | 0.00 |
| ar.L3 | 0.3527 | 0.062 | 5.730 | 0.000 | 0.232 | 0.473 | Heteroskedasticity (H): | 16.90 | Skew: | 1.30 |
| ma.L1 | -0.8338 | 0.177 | -4.700 | 0.000 | -1.182 | -0.486 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 8.48 |
| ma.L2 | -0.1261 | 0.175 | -0.721 | 0.471 | -0.469 | 0.217 | | | | |
| sigma2 | 2.3675 | 0.200 | 11.811 | 0.000 | 1.975 | 2.760 | | | | |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región V

| | | | | | | | | | | |
|---------------|-------------|----------------|----------|------------------|---------------|---------------|--------------------------------|------------------|--------------------------|----------|
| | | | | | | | | | | |
| | | | | | | | Dep. Variable: | Región V | No. Observations: | 141 |
| | | | | | | | Model: | ARIMA(1, 1, 1) | Log Likelihood | -148.042 |
| | | | | | | | Date: | Wed, 22 Nov 2023 | AIC | 302.083 |
| | | | | | | | Time: | 11:46:52 | BIC | 310.908 |
| | | | | | | | Sample: | 0 | HQIC | 305.669 |
| | | | | | | | | - 141 | | |
| | | | | | | | Covariance Type: | opg | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.96 | Jarque-Bera (JB): | 92.34 |
| ar.L1 | 0.9984 | 0.005 | 201.347 | 0.000 | 0.989 | 1.008 | Prob(Q): | 0.33 | Prob(JB): | 0.00 |
| ma.L1 | -0.9637 | 0.041 | -23.378 | 0.000 | -1.045 | -0.883 | Heteroskedasticity (H): | 7.40 | Skew: | 0.48 |
| sigma2 | 0.4789 | 0.035 | 13.650 | 0.000 | 0.410 | 0.548 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 6.86 |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región VI

| | | | | | | | | | | |
|---------------|-------------|----------------|----------|------------------|---------------|---------------|--------------------------------|------------------|--------------------------|----------|
| | | | | | | | | | | |
| | | | | | | | Dep. Variable: | Región VI | No. Observations: | 141 |
| | | | | | | | Model: | ARIMA(0, 2, 1) | Log Likelihood | -137.849 |
| | | | | | | | Date: | Wed, 22 Nov 2023 | AIC | 279.698 |
| | | | | | | | Time: | 11:46:52 | BIC | 285.567 |
| | | | | | | | Sample: | 0 | HQIC | 282.083 |
| | | | | | | | | - 141 | | |
| | | | | | | | Covariance Type: | opg | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.95 | Jarque-Bera (JB): | 36.47 |
| ma.L1 | -0.9335 | 0.029 | -32.656 | 0.000 | -0.990 | -0.877 | Prob(Q): | 0.33 | Prob(JB): | 0.00 |
| sigma2 | 0.4193 | 0.035 | 11.926 | 0.000 | 0.350 | 0.488 | Heteroskedasticity (H): | 6.78 | Skew: | 0.74 |
| | | | | | | | Prob(H) (two-sided): | 0.00 | Kurtosis: | 5.02 |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región VII

| | | | | | | | | | | |
|---------------|-------------|----------------|----------|------------------|---------------|---------------|--------------------------------|------------------|--------------------------|----------|
| | | | | | | | | | | |
| | | | | | | | Dep. Variable: | Región VII | No. Observations: | 141 |
| | | | | | | | Model: | ARIMA(0, 2, 3) | Log Likelihood | -276.724 |
| | | | | | | | Date: | Wed, 22 Nov 2023 | AIC | 561.449 |
| | | | | | | | Time: | 11:46:52 | BIC | 573.187 |
| | | | | | | | Sample: | 0 | HQIC | 566.219 |
| | | | | | | | | - 141 | | |
| | | | | | | | Covariance Type: | opg | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 0.35 | Jarque-Bera (JB): | 39.45 |
| ma.L1 | -0.7475 | 0.053 | -14.173 | 0.000 | -0.851 | -0.644 | Prob(Q): | 0.55 | Prob(JB): | 0.00 |
| ma.L2 | -0.6334 | 0.061 | -10.370 | 0.000 | -0.753 | -0.514 | Heteroskedasticity (H): | 20.73 | Skew: | 0.38 |
| ma.L3 | 0.4112 | 0.056 | 7.281 | 0.000 | 0.300 | 0.522 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 5.49 |
| sigma2 | 3.0592 | 0.251 | 12.188 | 0.000 | 2.567 | 3.551 | | | | |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).

Región VIII

| | | | | | | | | | | |
|---------------|---------|---------|-----------------------------------|-------|--------|--------|--------------------------------|------|--------------------------|-------|
| | | | Dep. Variable: Región VIII | | | | No. Observations: 141 | | | |
| | | | Model: ARIMA(2, 1, 0) | | | | Log Likelihood -196.460 | | | |
| | | | Date: Wed, 22 Nov 2023 | | | | AIC 398.919 | | | |
| | | | Time: 11:46:53 | | | | BIC 407.744 | | | |
| | | | Sample: 0 | | | | HQIC 402.506 | | | |
| | | | - 141 | | | | | | | |
| | | | Covariance Type: opg | | | | | | | |
| | | | | | | | | | | |
| | coef | std err | z | P> z | [0.025 | 0.975] | Ljung-Box (L1) (Q): | 2.16 | Jarque-Bera (JB): | 34.82 |
| ar.L1 | 0.3612 | 0.057 | 6.293 | 0.000 | 0.249 | 0.474 | Prob(Q): | 0.14 | Prob(JB): | 0.00 |
| ar.L2 | -0.0747 | 0.070 | -1.070 | 0.285 | -0.211 | 0.062 | Heteroskedasticity (H): | 6.20 | Skew: | -0.14 |
| sigma2 | 0.9683 | 0.088 | 11.004 | 0.000 | 0.796 | 1.141 | Prob(H) (two-sided): | 0.00 | Kurtosis: | 5.43 |

Warnings:

[1] Covariance matrix calculated using the outer product of gradients (complex-step).