

| Feature Name | Description | Calculation | Dimensionality | Mean | Std | Min | Max |
|-------------------------|---|------------------------------|----------------|----------|---------|---------|----------|
| Duration (s) | Length of audio file in seconds. | Total time from start to end | 1 | 3.70 | 0.34 | 2.94 | 5.27 |
| RMS Amplitude | Average signal energy. | Mean RMS amplitude | 1 | 0.01 | 0.01 | 0.00 | 0.09 |
| Pitch (Hz) | Fundamental frequency (F0) in Hz. | Mean pitch (Hz) | 1 | 586.80 | 194.32 | 186.02 | 1278.77 |
| Spectral Centroid (Hz) | Center of mass of the spectrum. | Mean spectral centroid | 1 | 5560.18 | 810.07 | 2604.36 | 7655.34 |
| Spectral Bandwidth (Hz) | Spread of the spectrum. | Mean spectral bandwidth | 1 | 5054.06 | 568.49 | 2753.38 | 6368.17 |
| Spectral Rolloff (Hz) | Frequency below which 85% of energy is contained. | Mean spectral rolloff | 1 | 10841.66 | 1502.52 | 4997.52 | 14629.60 |
| MFCC | Cepstral coefficients (mean of 13). | Mean of 13 MFCCs | 13 | -43.51 | 6.19 | -65.02 | -24.06 |
| Chroma | Pitch class energy (mean of 12). | Mean of 12 chroma features | 12 | 0.51 | 0.08 | 0.31 | 0.72 |
| Zero-Crossing Rate | Rate of sign changes in waveform. | Mean zero-crossing rate | 1 | 0.07 | 0.02 | 0.03 | 0.17 |