



REPUBLIC OF LIBERIA
MINISTRY OF TRANSPORT
DIVISION OF METEOROLOGY
LIBERIA METEOROLOGICAL SERVICE (LMS)
Contact us: +231886565078/+231776679045



Email: meteoliberia.transport@yahoo.com/website: <https://meteoliberia.com>

VOLUME N° 35: SECOND DEKA OF DECEMBER 2025



Summaries

- ◆ Rainfall Analysis
- ◆ Temperature Analysis
- ◆ Potential Evapotranspiration
- ◆ Livelihood Comfortability Index
- ◆ Vegetative Condition
- ◆ Monthly Forecast
- ◆ Farmer Advisory

AGROMETEOROLOGICAL CONDITION

Rainfall during the second Dekad of December 2025: The second DEKAD of December 2025 were characterized by moderate rainfall in the southern part of the country. The north and some parts of central recorded low rainfall during this period. Nationwide, rainfall amounts ranged from **25.1mm** to **75.1mm** (Figure 1).

Normal rainfall (1990-2020): As compare to the normal rainfall western to central region recorded above normal rainfall as shown in light to deep green. However, the southeast region experienced low rainfall (figure 2).

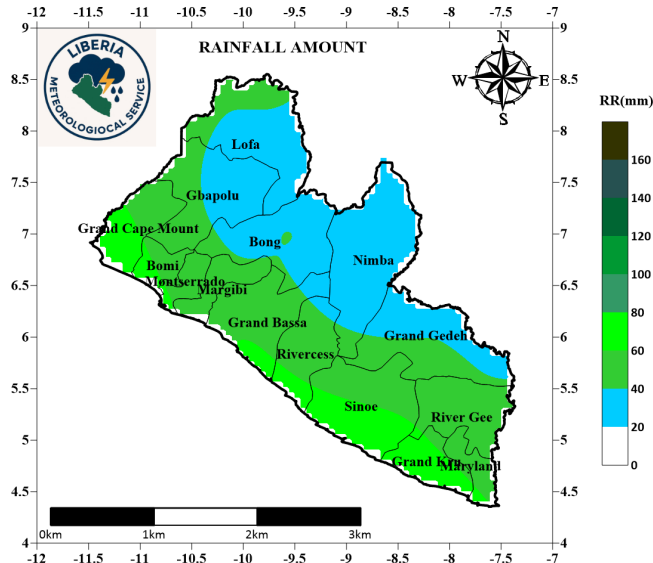


Figure 1: Rainfall amount

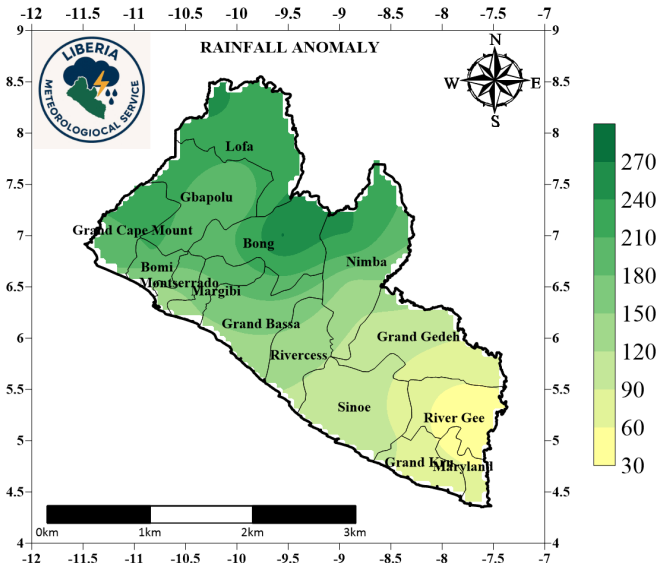


Figure 2: Rainfall Normal (1990-2020)

Number of rainfall days during the second DEKAD of December 2025: During the second DEKAD of December 2025, most parts of the country received rainfall between four to eight days. However, Maryland and Grand Kru, river Gee, Sinoe and part of Margibi, Montserrado, Bomi and G. Cape mount counties recorded the highest rainfall days (figure 3).

Soil Moisture Index (SMI) during the Second DEKAD of December 2025: The second DEKAD of December 2025 shows that costal region experienced above normal moisture content in the soil. Additionally, northern parts of the country observed normal moisture content in the soil accept upper Nimba which experienced below normal moisture in the soil (figure 4).

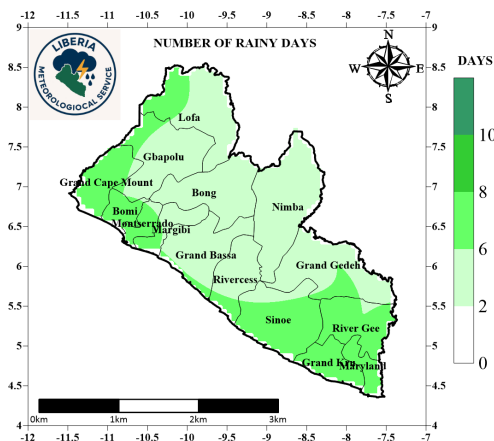


Figure 3: Number of rainfall days

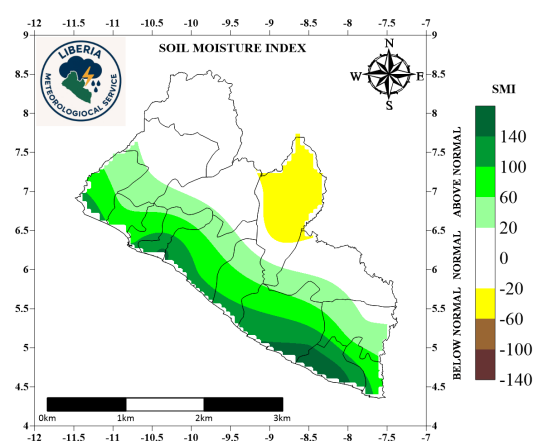


Figure 4: Soil Moisture Index

EVOLUTION OF TEMPERATURES

Maximum Temperature: The second DEKAD of December 2025 was marked by an increase in maximum temperatures in River Gee, Maryland, Rivercess, parts of Nimba, Bong, G. Bassa Montserrado, Bomi and G. Cape Mount. The rest of the country received low temperature. Maximum temperatures ranged between 26.9°C and 29.2°C (Figure 6).

Compared to the long-term mean (1990–2020), the western and northern parts of the countries experienced below normal maximum temperature as shown in blue. However, Maryland, Grand Gru and part of Montserrado, G. Bassa and upper Lofa county experienced normal temperature (Figure 7).

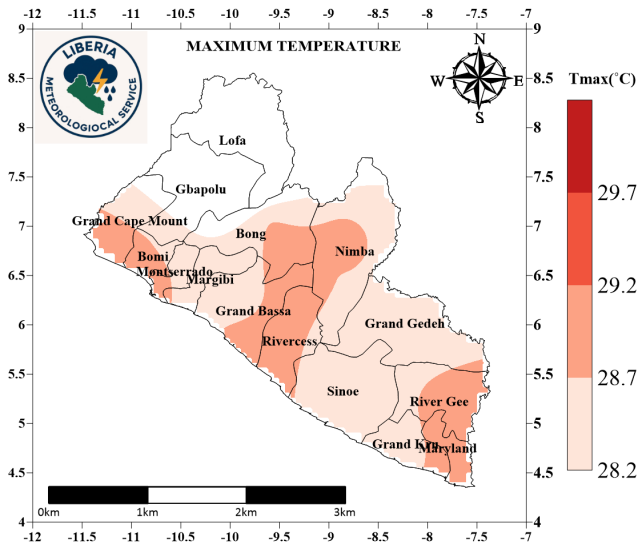


Figure 5: Maximum temperatures at 2m

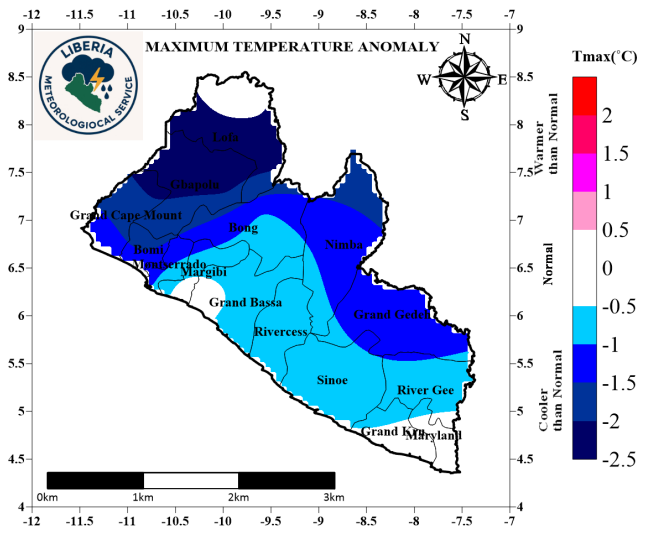


Figure 6: Maximum Temperature (1991-2020)

Minimum Temperature: The second DEKAD of December 2025 were marked by variations in minimum temperatures. The southern (costal) region experienced highest values, while the northern and northwestern region experienced the lowest. Minimum temperature during this period ranged from 18.2°C to 25.1°C (figure 7).

Compared to the long-term mean (1990–2020), Gbapolu and part of Lofa, Grand Cape Mount Margibi and Bong experienced an increase in minimum temperature while the other parts of Country experienced normal condition (figure 8).

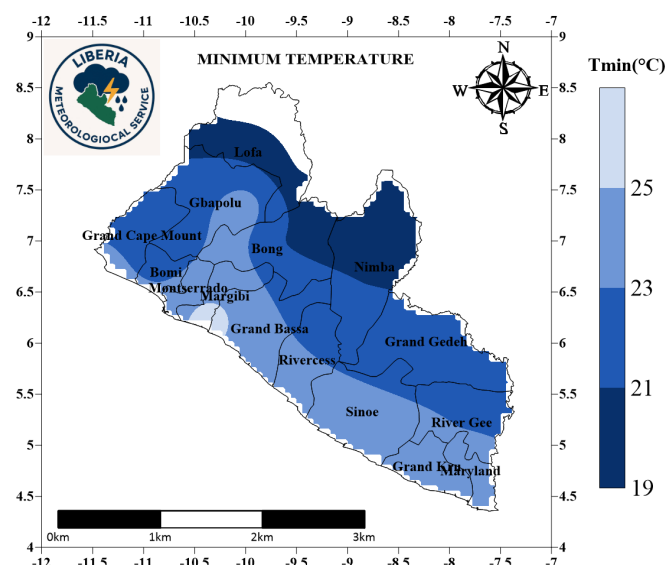


Figure 7: Minimum temperatures at 2m

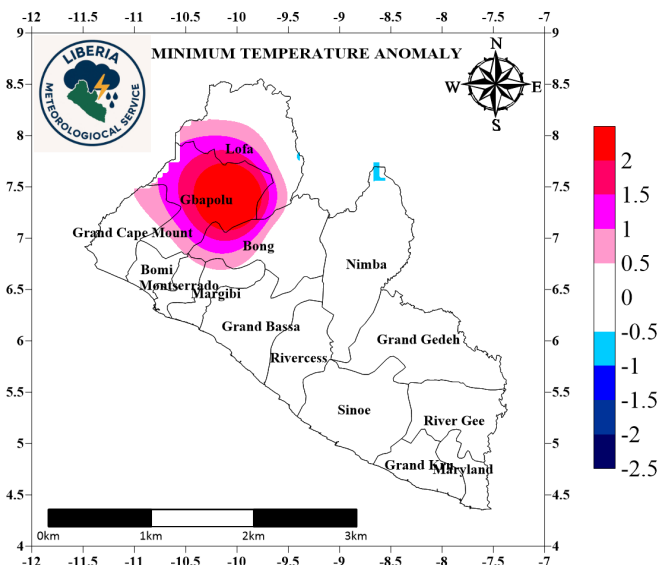


Figure 8: Minimum Temperature Normal (1991-2020)

POTENTIAL EVAPOTRANSPIRATION

During the second DEKAD of December 2025, the north and northwest parts of the country experienced high evapotranspiration rates. The central to the western region experienced moderate evapotranspiration rate while the costal region experienced low evapotranspiration rates (Figure 9).

Livestock Comfortability Index (LCI): During the second DEKAD of December 2025, livestock experienced mild to moderate thermal stress due to rising daytime temperatures, moderate humidity, and reduced wind speeds. Animals shows slight discomfort and reduced feeding during peak afternoon hours, but no major health risks are anticipated with proper shade and hydration (Figure 10).

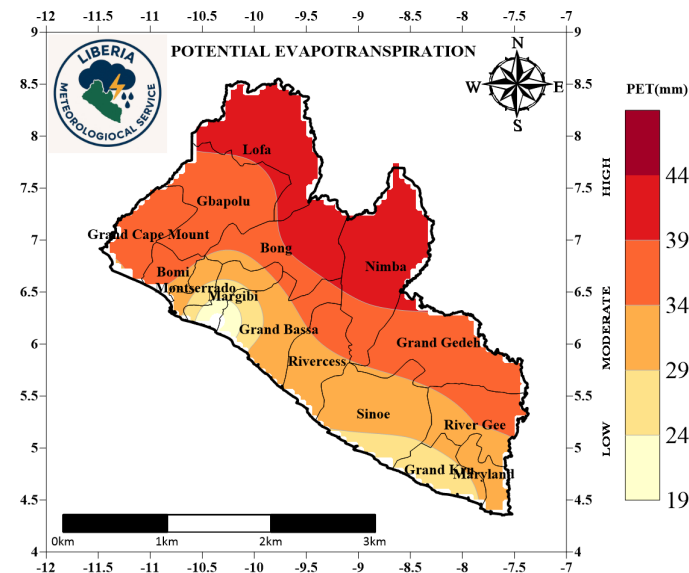


Figure 9: DEKAD one Potential Evapotranspiration

Normalized difference Vegetation Index (NDVI): During the second DEKAD of December 2025, the southeast part of the country were covered by dense vegetation. However, the southern region experienced less dense vegetation (Figure 10)

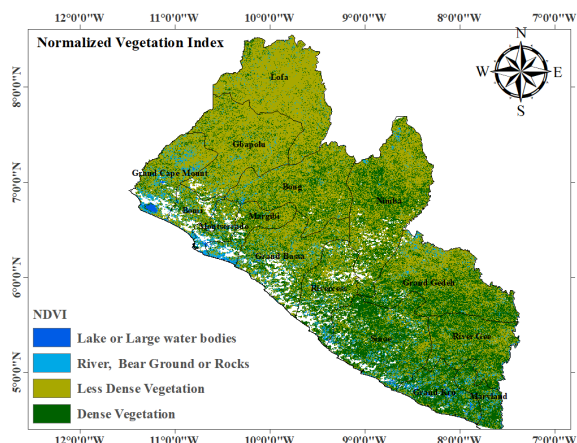


Figure 11: NDVI

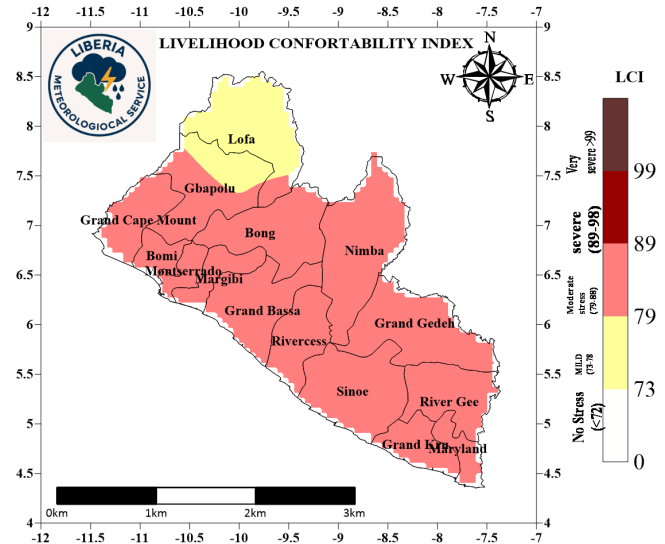


Figure 10: DEKAD one Livestock Comfortability Index
FORECAST FOR THE MONTH OF DECEMBER 2025

RAINFALL: In December 2025, the forecasted cumulative rainfall amount across the counties is anticipated to be between 25.3 mm and 119.4 mm. The south-east coastal counties are expected to record rainfall amounts between 60.0 mm and 110.0mm. Rainfall amounts of below 60.0 mm are predicted over the northern counties figure 11.

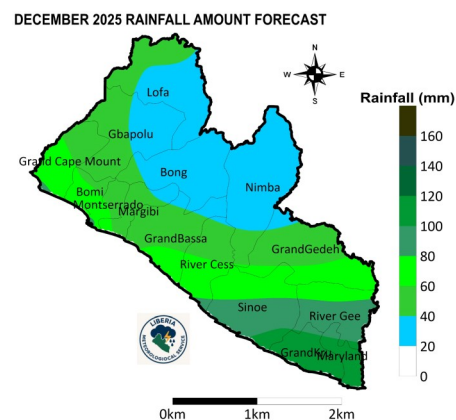


Figure 12: Rain forecasts for December 2025

FORECAST FOR THE MONTH OF DECEMBER 2025

DECEMBER 2025 RELATIVE HUMIDITY FORECAST

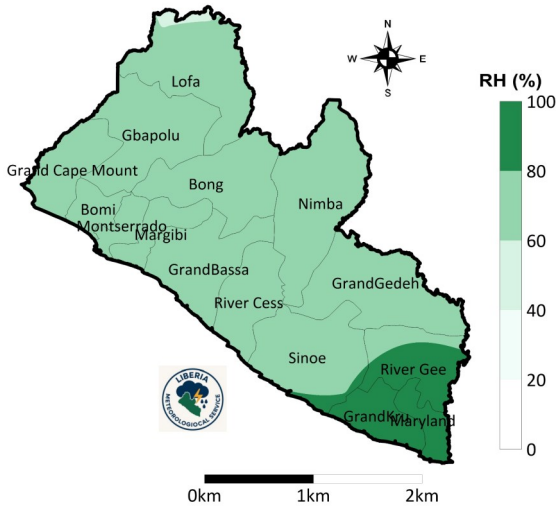


Figure 13: Relative humidity forecasts for December 2025

Relative Humidity: Relative humidity across Liberia for December 2025 is predicted to range from 69% to 83%, as shown in Figure 12. The highest range of values (80–83%) is expected in the southern counties. The extreme north is expected to record the lowest relative humidity, 69% while the rest of the country is expected to record a range of 70% to 80%.

DECEMBER 2025 MAXIMUM TEMPERATURE FORECAST

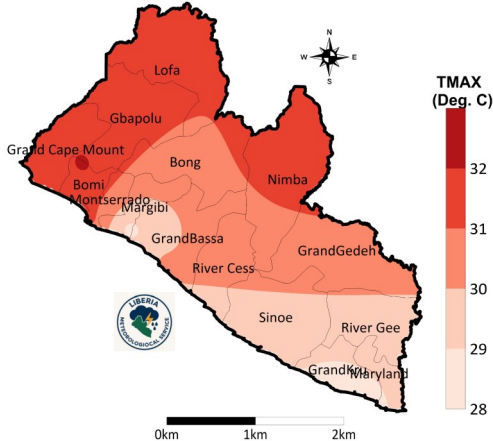


Figure 14: Tmax forecasts for December 2025

Maximum Temperature: The maximum temperature in December 2025 is anticipated to be 28.6°C to 32.1°C across the counties. The lowest and highest maximum daytime temperatures of 28.6°C and 32.1°C are predicted over Margibi and Grand Cape Mount counties (figure 13).

DECEMBER 2025 MINIMUM TEMPERATURE FORECAST

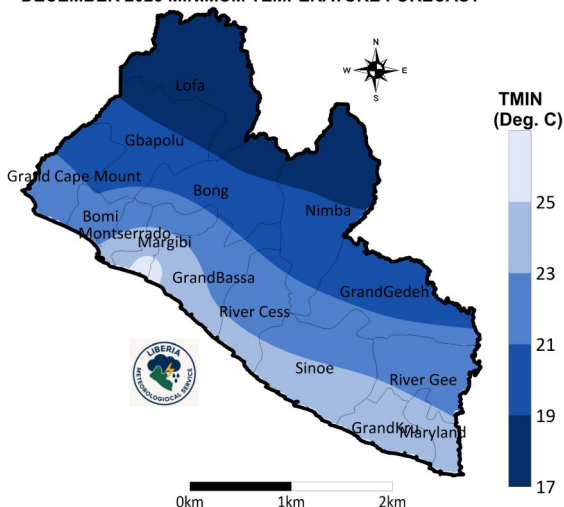


Figure 15: Tmin forecasts for December 2025

Minimum Temperature: Nighttime temperatures across the country in December 2025 are anticipated to range between 17.4°C and 25.9°C. The lowest nighttime temperature range of 17.4°C to 19.0°C is anticipated in Lofa, parts of Gbapolu, Bong and Nimba counties, while the highest nighttime temperature of 25.9°C is expected over parts of Margibi County (Figure 14).

Farmers Advisories

As rainfall is expected to continue in the third Dekad and soil remain steady saturated, farmers are strongly encouraged to take the following precautions in their agricultural practices:

- **Field Preparation:**

Properly prepare fields to reduce the risk of flooding and minimize potential crop damage.
Create drainage channels where possible to prevent waterlogging.

- **Crop Management:**

Plant water-resistant or flood-tolerant crop varieties to reduce the risk of losses.
Monitor crops regularly for signs of disease or stress caused by excess moisture.
Irrigate only when you observe reduced soil moisture, and avoid overwatering during wet periods

- **Livestock Management:**

Move animals to higher ground to avoid flooding and reduce the risk of waterborne diseases.
Ensure animals are properly housed and maintain good hygiene to prevent disease outbreaks.
Provide clean drinking water regularly to prevent dehydration and heat stress.
Check livestock frequently for symptoms of illness and provide timely treatment when needed

- **General Precautions:**

Stay informed about weather updates through the Liberia Meteorological Service website.
Work closely with local agricultural extension officers for region-specific advice on crop and livestock management

By taking these proactive measures, farmers can protect their crops and livestock, reduce losses, and maintain productive agricultural practices during periods of increased rainfall

Average values of meteorological parameters for the second DEKAD of December 2025

Stations	Temperature at two (2) meters			Precipitation	Humidity
	Ave. Tx	Ave. Tn	Ave. Temp	Rainfall Sum	Ave. Hum.
AGBAS81	28.8	23.9	26.4	63.6	82.6
AGBEL87	27.3	24.0	25.7	29.9	82.0
AGCAR83	28.8	20.8	24.8	40.6	83.7
AGFOY86	26.9	18.2	22.6	41	79.0
AGFTI80	28.7	21.7	25.2	55.7	84.1
AGFTW82	28.9	22.9	25.9	43.7	85.7
AGGCM89	29.2	23.8	26.5	75.1	82.3
AGSAR85	28.9	20.5	24.7	32.9	83.4
AGVON84	26.9	18.2	22.6	43.1	79.0
AGZOR88	27.0	18.4	22.7	34.7	78.9
RF-06-KAB	28.5	24.1	26.3	68.9	83.0
SYGCA64	28.5	25.1	26.8	70.8	80.9
SYHAR63	29.1	24.2	26.7	61.4	82.8
SYROB60	28.2	26.0	27.1	40.6	77.8
SYSPA65	29.0	23.8	26.4	63.4	81.9
SYTPT62	28.7	21.2	25.0	25.1	85.7
SYZWD61	28.4	21.6	25.4	39.3	86.1

LIBERIA METEOROLOGICAL SERVICE

Ministry of Transport

Corner of Carey and Warren Streets
Monrovia, Liberia

Phone: +231777285950/+231776679045

Email: meteoliberia.transport@yahoo.com

**Motto: Weather is everybody
business**

The Liberia Meteorological Service (LMS) is responsible for providing meteorological services to support the social and economic progress of Liberia, ensure the safety and well-being of its population, and fulfil its international obligations.

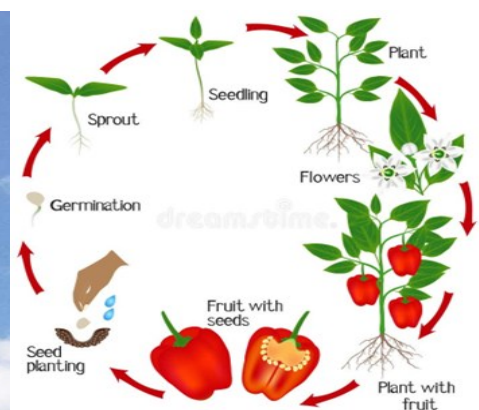
It was created by an Act of Legislation in April 1972 and was placed under the Ministry of Transport. Prior to that, it was under the Ministry of Commerce, Industry and Transportation.



Hot pepper



MET. Observation



Phenology of pepper