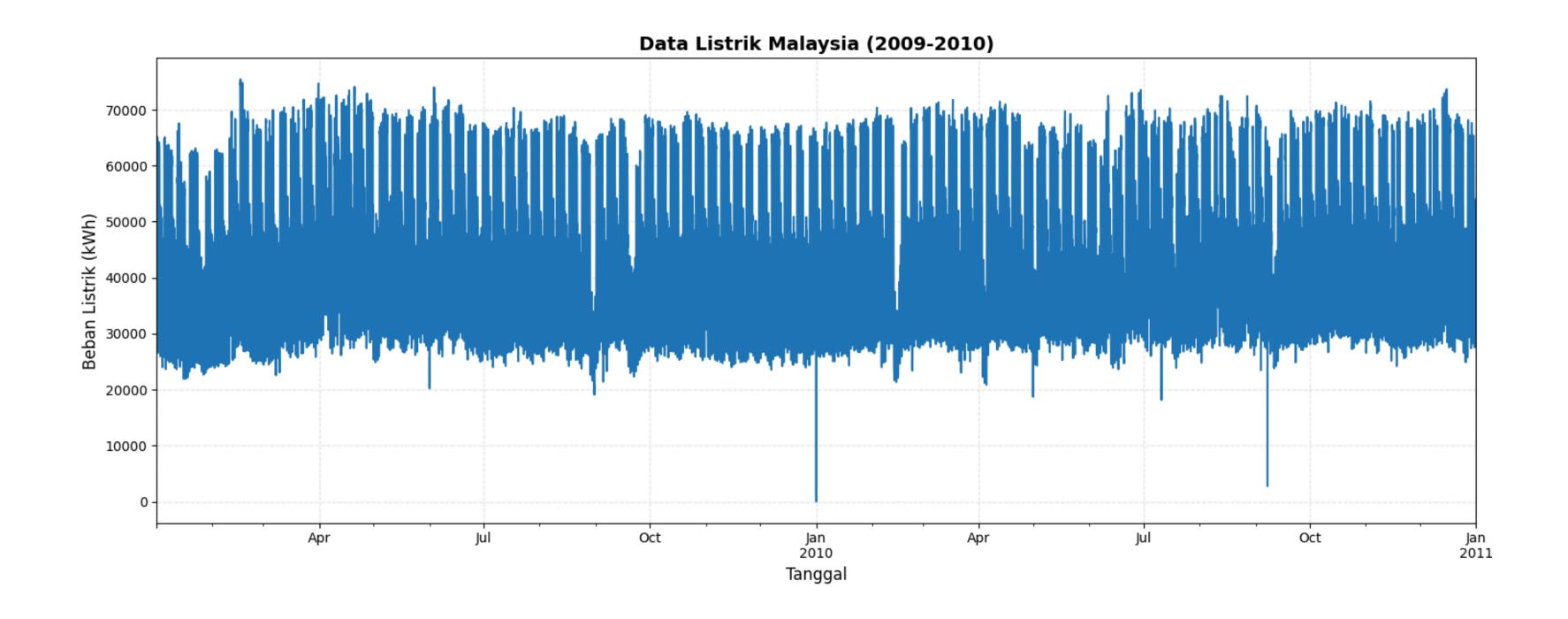
# Progress Report 2

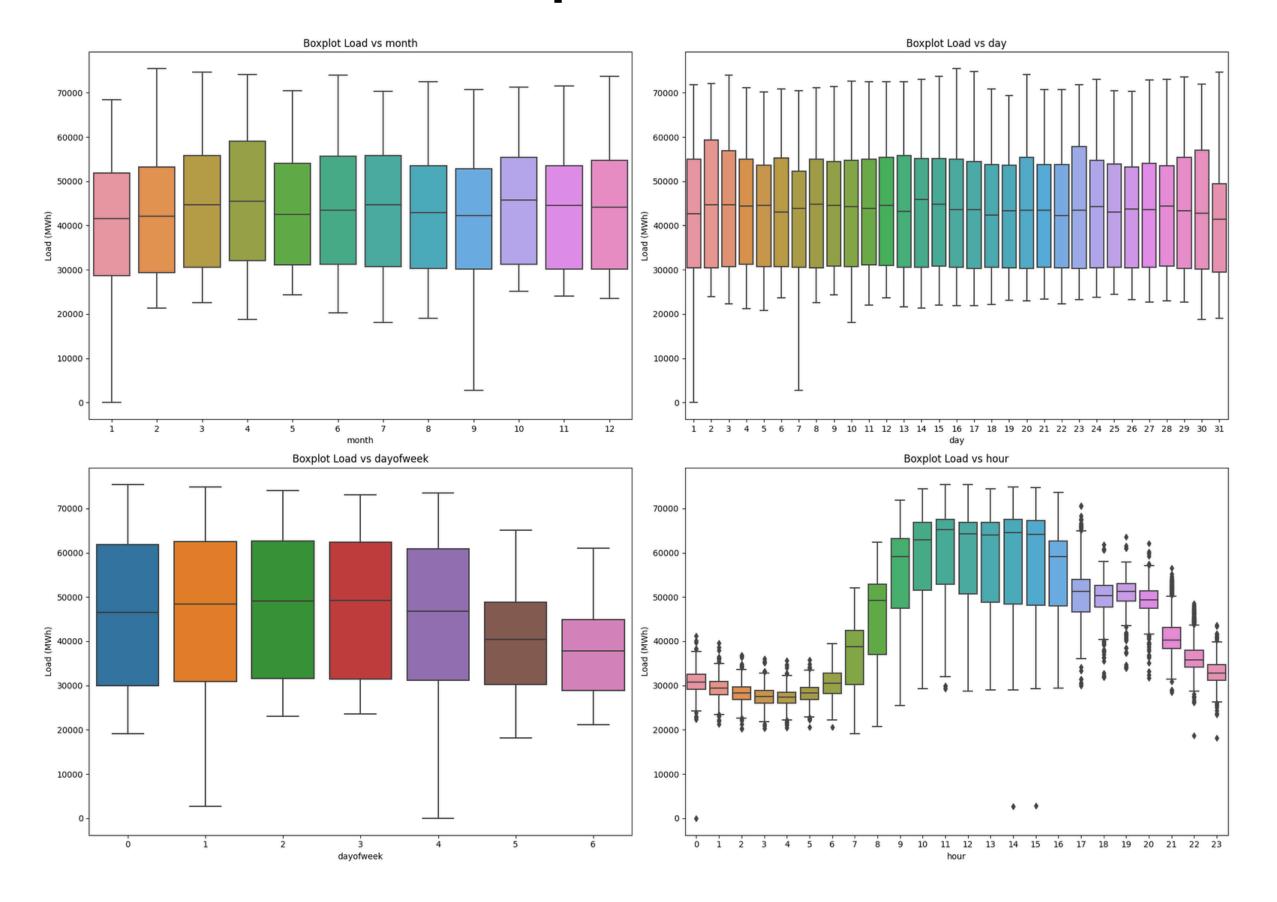
# Progress:

- 1. Melakukan pemodelan XGBoost Recursive menggunakan SHAP Value tanpa cross validasi dengan beberapa variabel eksogen:
  - Lag\_y (1-24)
  - Fitur Kalender (Jam, Hari, Bulan)
  - Fitur MA (MA\_72)

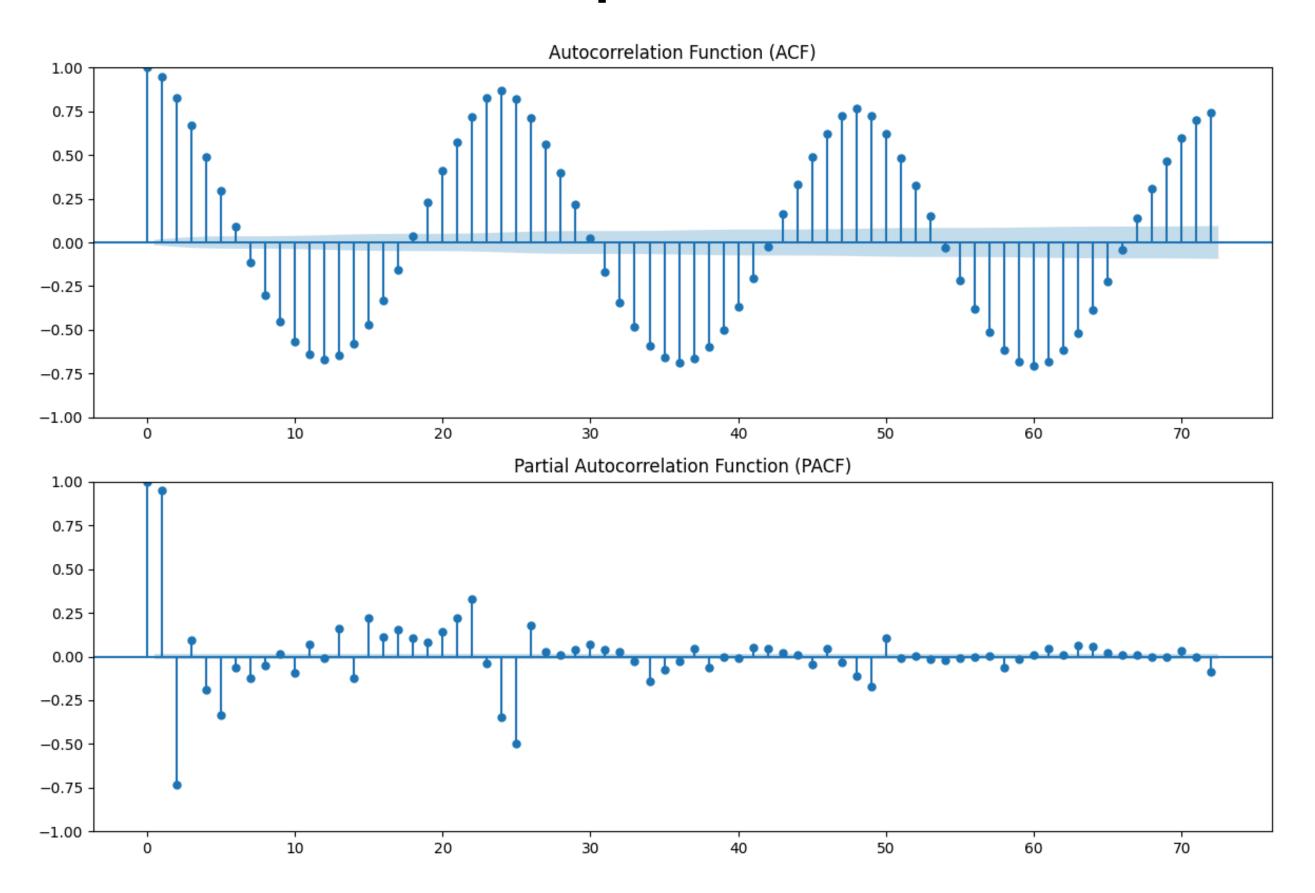
#### **EDA: Data Awal**



#### **EDA: Komponen Deterministik**

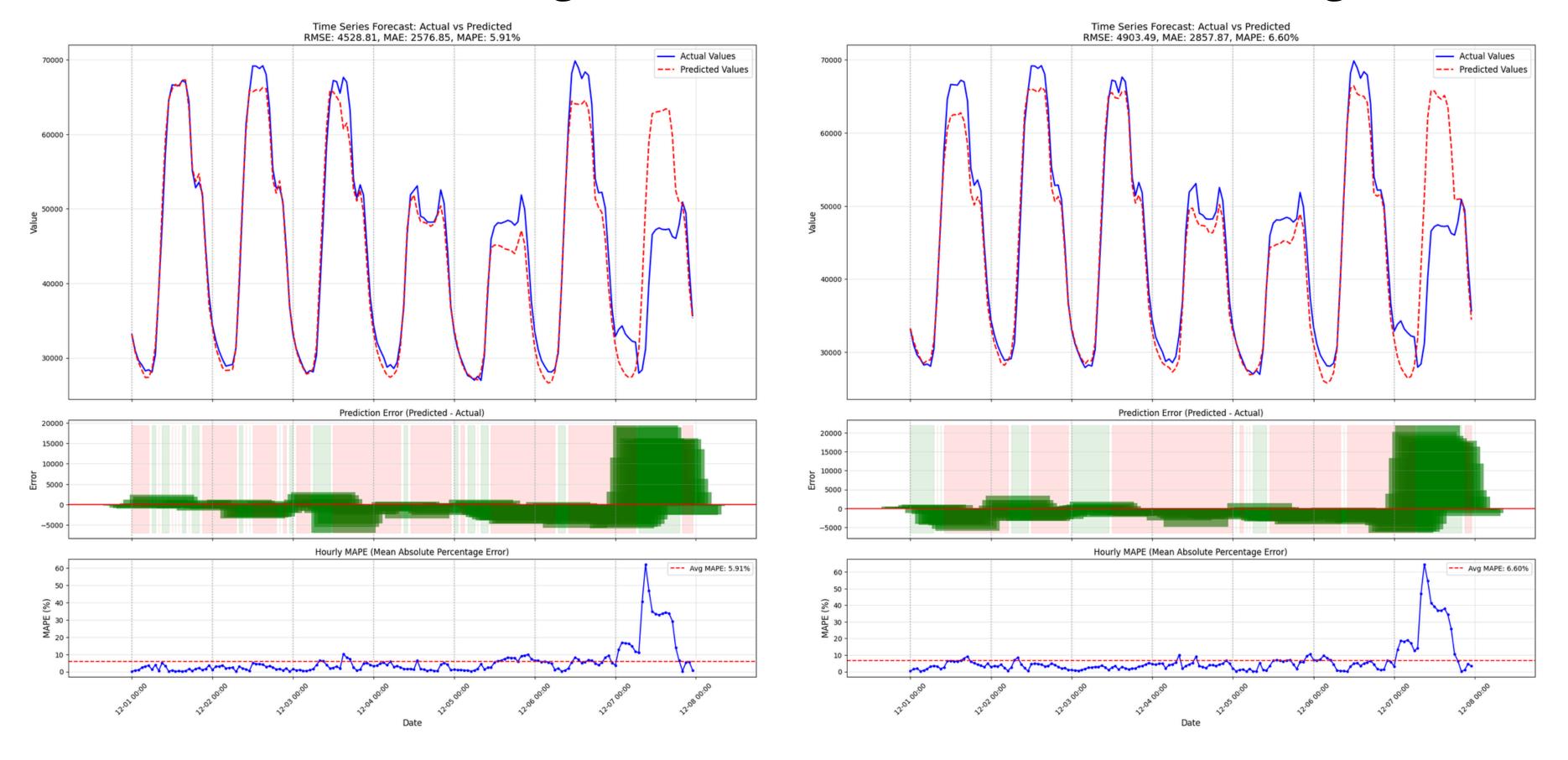


#### **EDA: Komponen Stokastik**



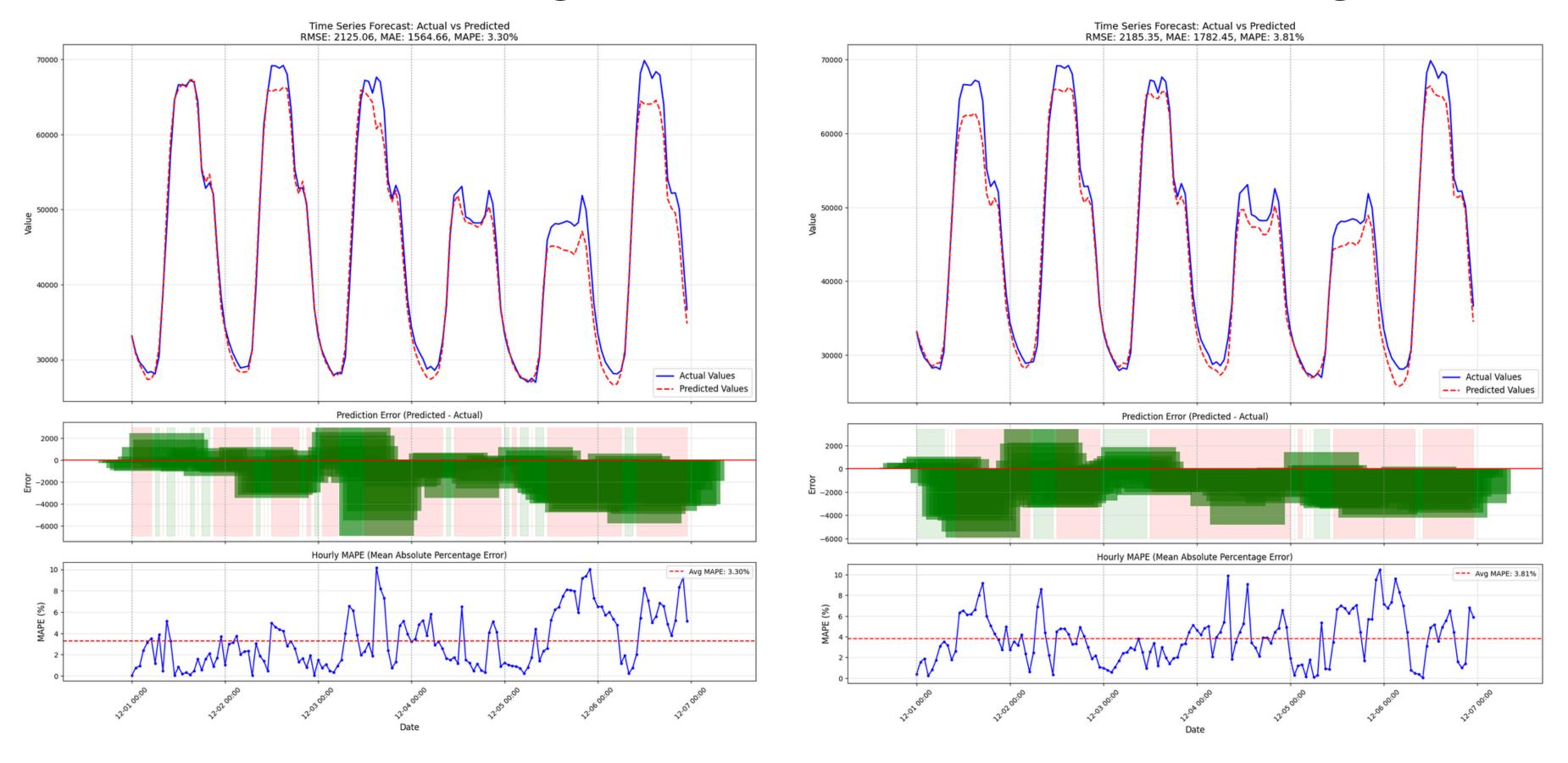
#### **One Hot Encoding**

#### **Ordinal Encoding**

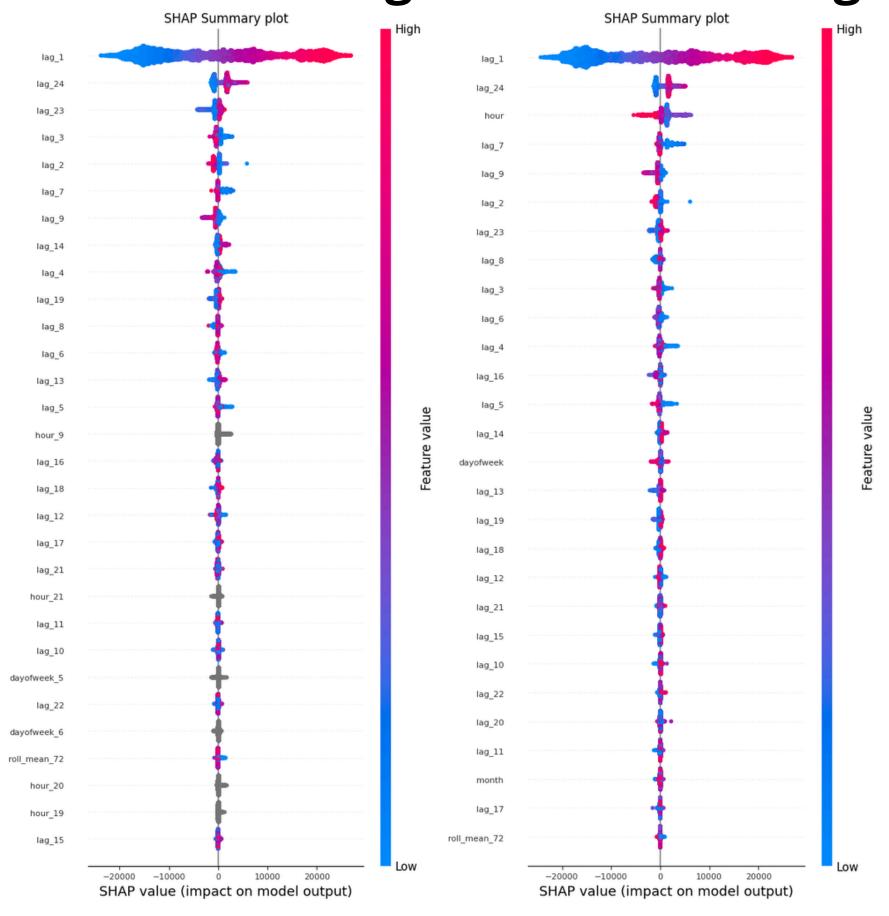


#### **One Hot Encoding**

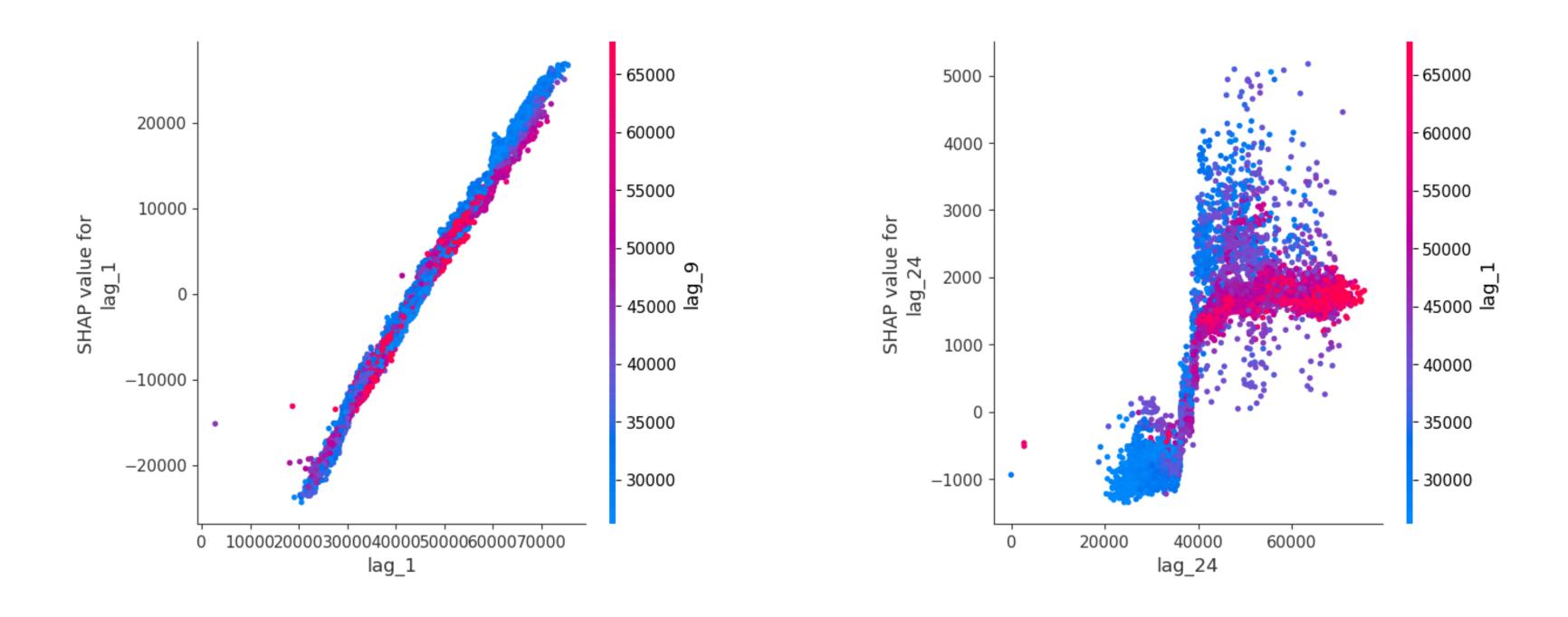
#### **Ordinal Encoding**



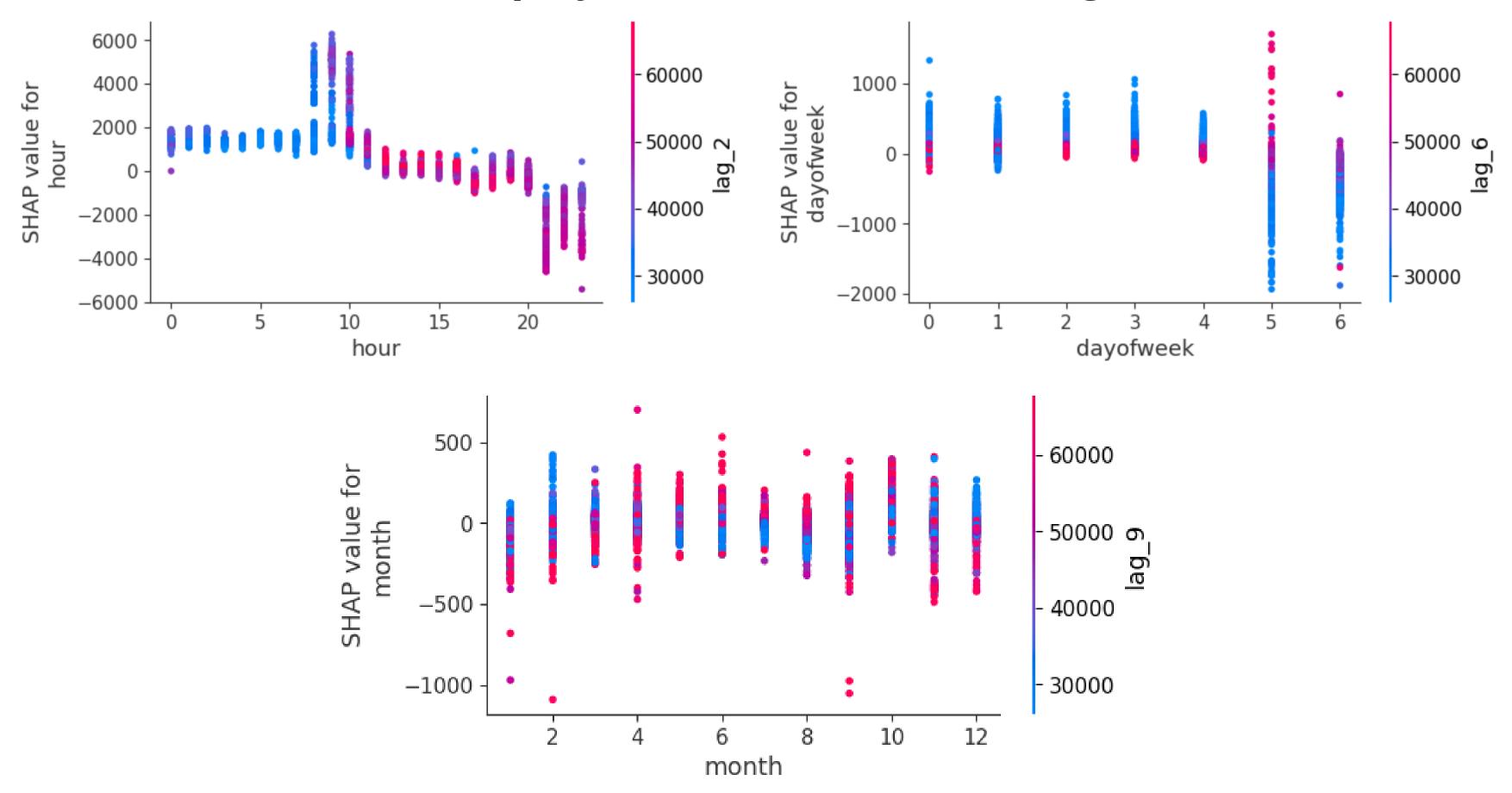
#### One Hot Encoding Ordinal Encoding



#### **Shapley Value Ordinal Encoding**



#### **Shapley Value Ordinal Encoding**



### Kendala:

- 1. Lebih banyak data lebih baik
- 2. Belum terbayang implementasi Shapley Value untuk TimesFM

## To do:

- 1. Menambahkan Cross Validation
- 2. Menambahkan Lebih banyak variabel Exogen:
- Holiday (Lag Before, Lag After)
- Lebih banyak MA (3 Bulan, 1 Bulan, 1 Minggu)
- 3. Melakukan Feature Selection
- 4. Mencoba TimesFM