

# CU18\_MODEL\_DEVELOPMENT\_02\_GLM

June 12, 2023

#

CU18\_Comportamienta Infra. Eventos extremos

## 1 IV. Model development

En este anexo se incluye el código utilizado durante el desarrollo de los modelos incluidos en el caso de uso.

### 1.1 Modelo GLM

#### 1.1.1 Paquetes

```
[1]: library(readr)
     library(dplyr)
```

Attaching package: 'dplyr'

The following objects are masked from 'package:stats':

filter, lag

The following objects are masked from 'package:base':

intersect, setdiff, setequal, union

#### 1.1.2 Datos

```
[2]: df <- read_csv("CU_18_05_20_diario_infra.csv")
```

Rows: 415370 Columns: 10

-- Column specification

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Delimiter: ","

dbl (9): id\_inf, capacidad, demanda, evento\_infra, evento\_zona, tmed,

```
prec,...  
date (1): fecha
```

*i* Use ``spec()`` to retrieve the full column specification for this data.  
*i* Specify the column types or set ``show_col_types = FALSE`` to quiet this message.

### 1.1.3 Ajuste modelo

```
[3]: mod_infra <- df |> select(-c(id_inf, fecha, evento_zona)) |>  
      glm(evento_infra ~ ., data = _, family = binomial)  
  
mod_zona <- df |> select(-c(id_inf, fecha, evento_infra)) |>  
      glm(evento_zona ~ ., data = _, family = binomial)  
  
write_rds(mod_infra, "mod_glm_infra.rds")  
write_rds(mod_zona, "mod_glm_zona.rds")
```