

- General comments

The manuscript presents a regional model for estimating flow duration curves for ungauged basins in Sicily. The analysed basins have different flow behaviours perennial and ephemeral. The manuscript represents a substantial contribution to scientific progress, specifically substantial data and results for Mediterranean zones.

- Specific comments

- Would you explain why several basins have the same colour in Fig 1.
- The Fig 2 is inappropriate, the discharges reach  $10^3 \text{ m}^3/\text{s}$ , while in the text (§20, p7063) the mean daily observed discharges vary from  $0.04 \text{ m}^3/\text{s}$  to  $7.6 \text{ m}^3/\text{s}$ . The discharges greater than  $10 \text{ m}^3/\text{s}$ , result from the extrapolation of the empirical distributions.
- §5, p 7066: which methods have been used to estimate the three model parameters ( $D_w$ ,  $a$  and  $b$ )?
- §5, p7066: “*The same figure shows a good fit between empirical and estimated FDC’s*”. The analysis of the figure is not sufficient to compare two samples or distributions. For the selection of “good distribution”, it is necessary to use goodness-of-procedures: analytical ones (Kolmogorov-Smirnov, Anderson-Darling, Cramér von Mises , Khi square etc.) or graphical methods like q-q plots.
- The graphical analysis of FCD sub-zone 2 (Fig4) shows an important difference between empirical FCD and fitted FCD. It seems to come from  $a$  (RMSE, zone 2 = 0.34, table 3).

- Technical comments

- Add a legend to Fig 1 (colour, black lines, red circle).
- Some basins have black boundaries and others are without boundaries. The boundaries should be standardized.
- Fig 4 has to be divided in two figures: sub-zones and FDC’s
- The size of FDC (Fig 4) is so small to be well interpreted. It should be better to raise the figure scale and add secondary axis on the graph.
- The scale of the different FDC curves has to be standardized.
- It should be better to superimpose Fig 1 (basins) and Fig 4 (zones).
- Table 1 and Table 2 are not readable.