



Preparation of Bioplastic Films from *Abelmoschus esculentus* by Microwave Assisted Extraction: Influence of Microwaving Time on the Film's Properties



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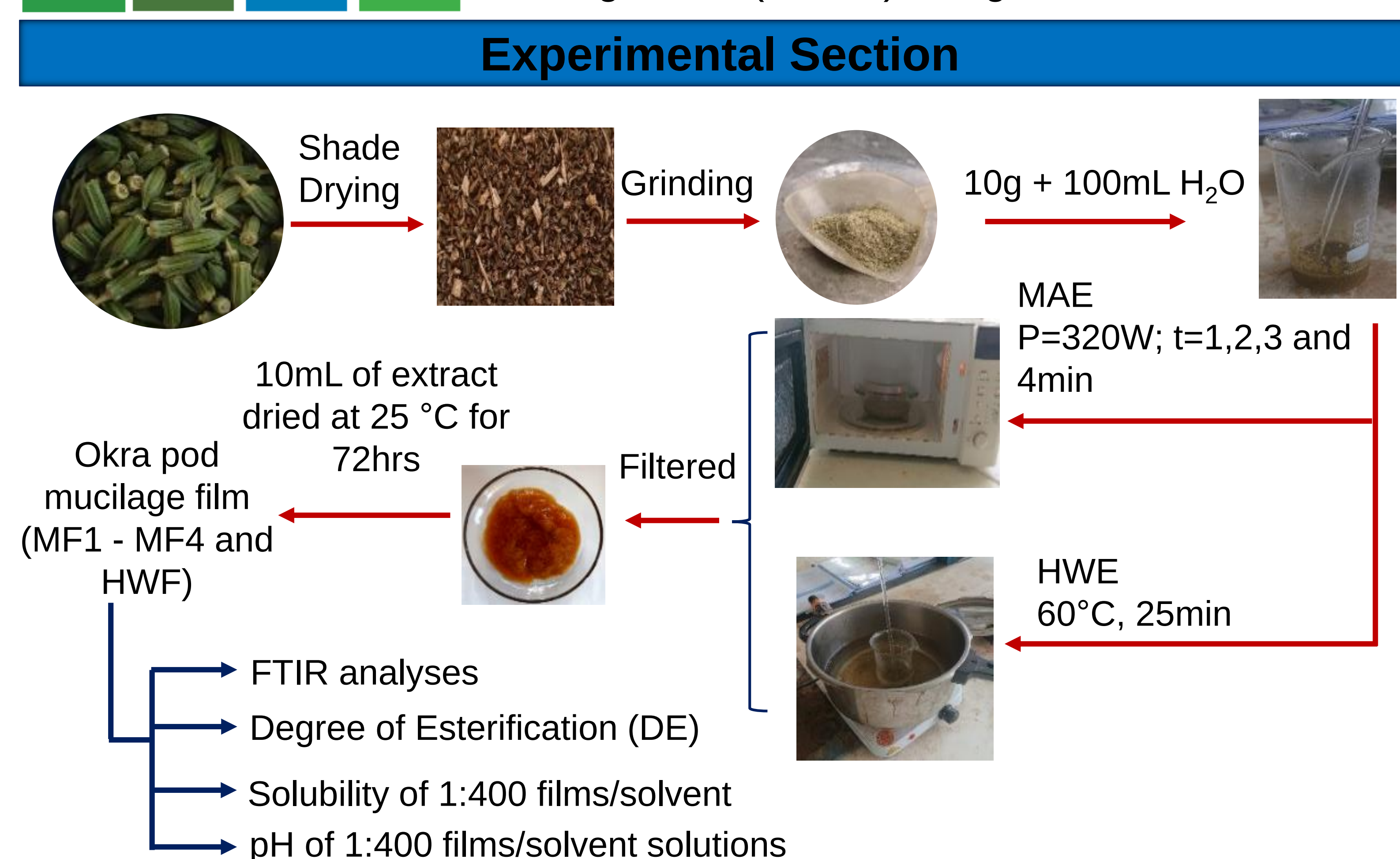
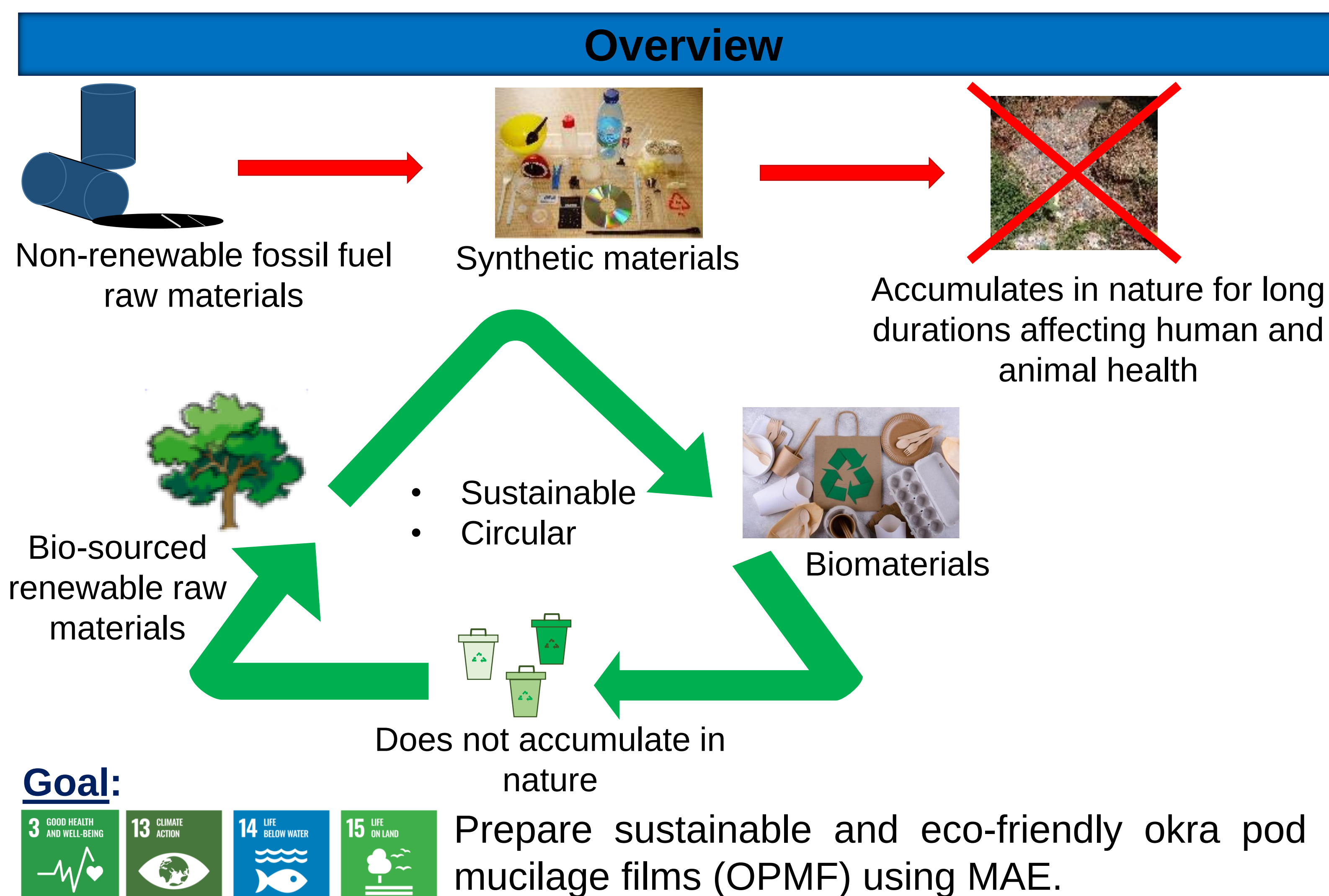
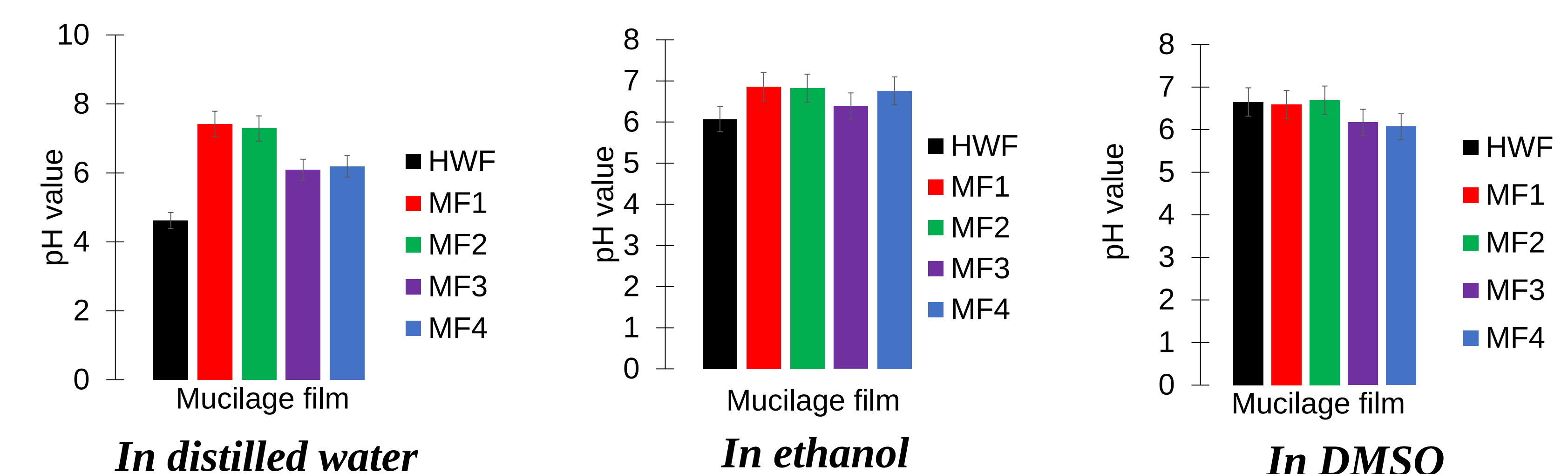
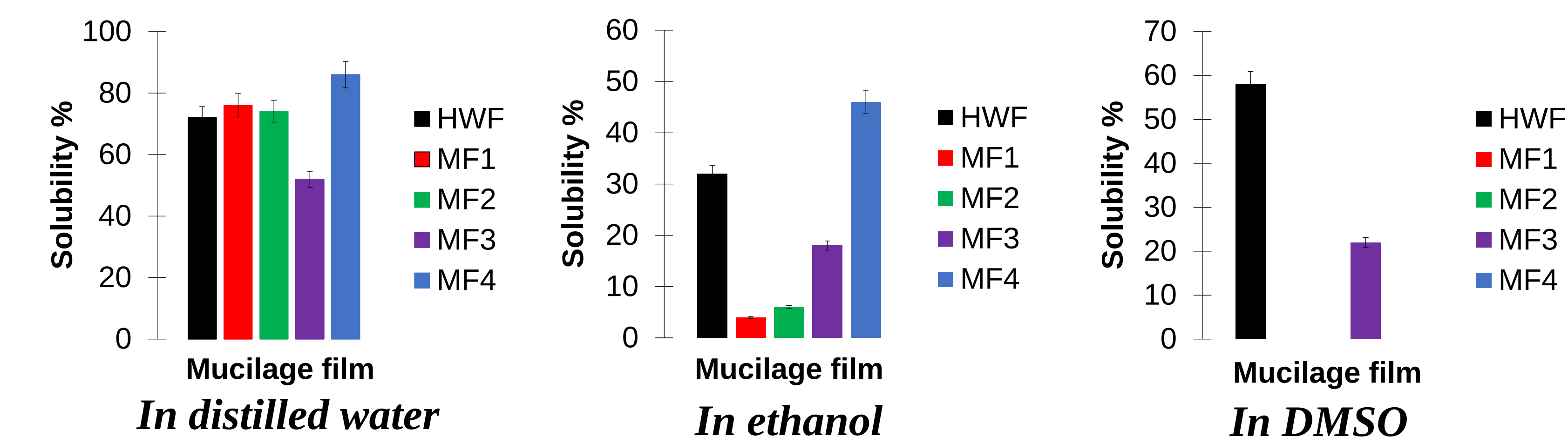
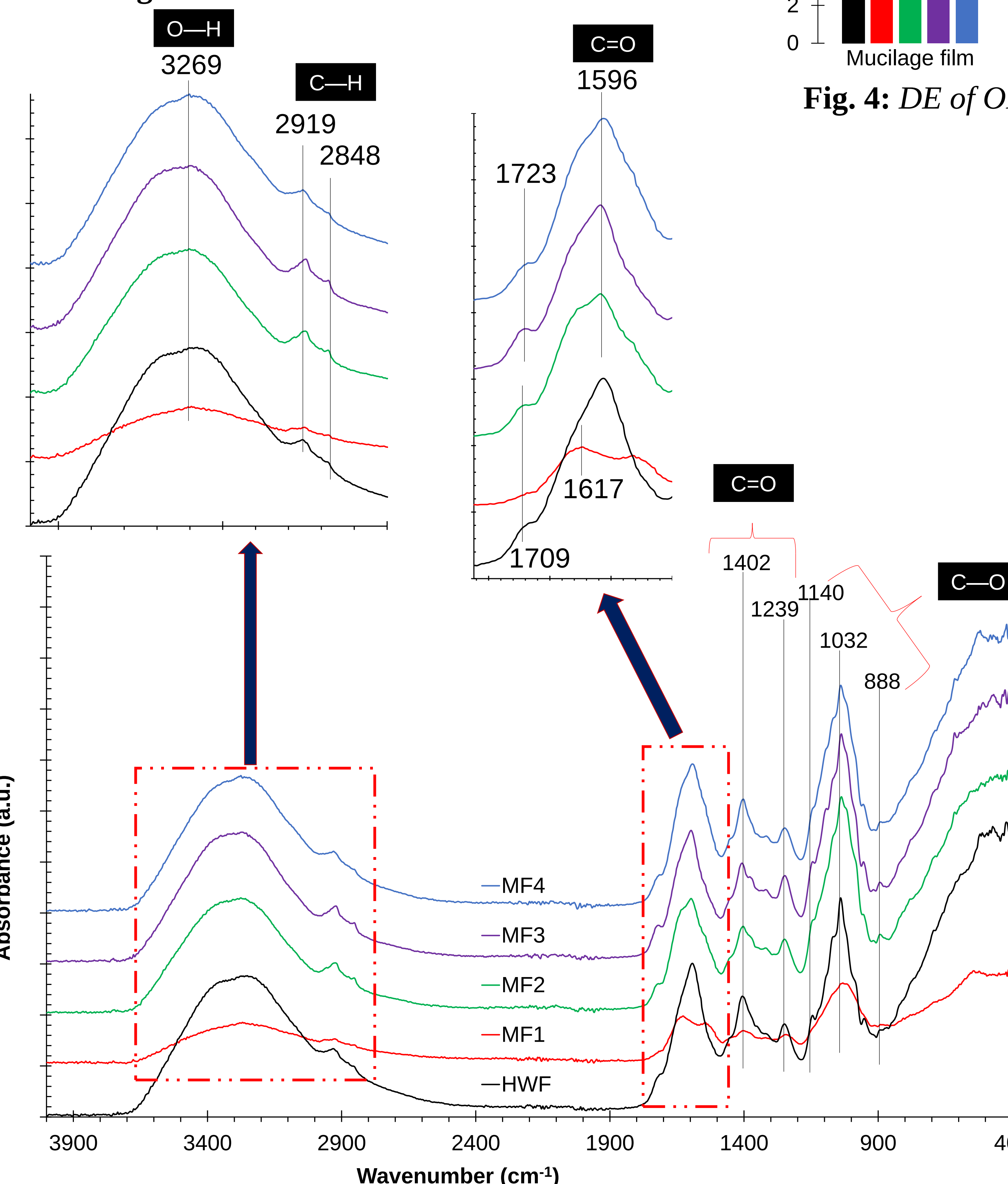
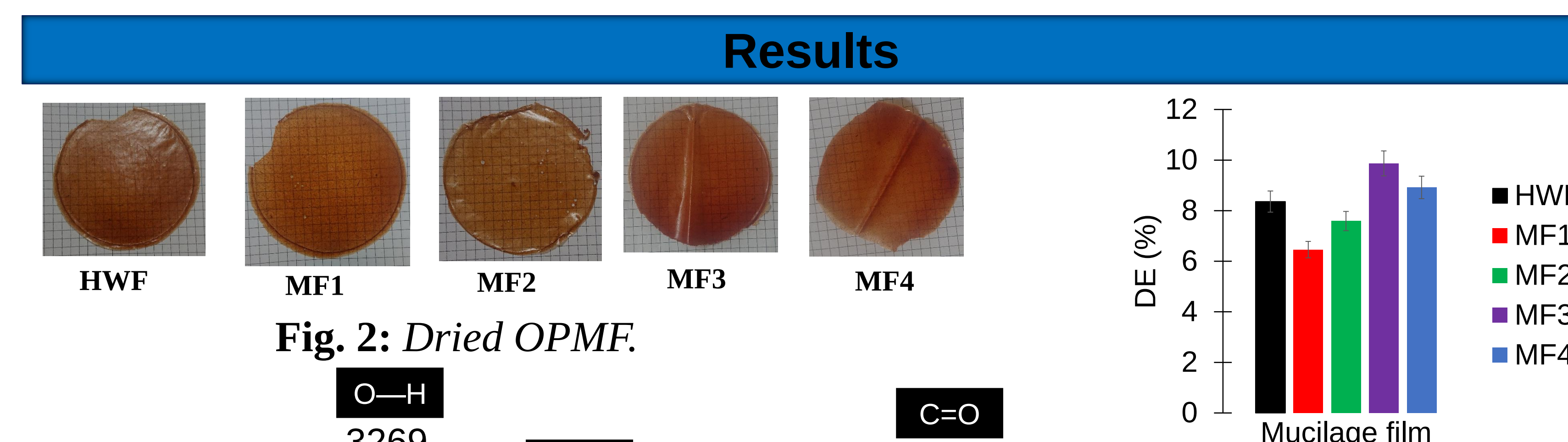


Fig. 1: Okra pod mucilage film (OPMF) preparation protocol



Conclusion

- The prepared OPMFs exhibited different colours.
- The observation of FTIR spectra revealed structural and DE variations as the microwaving time is increased.
- The prepared OPMFs were of different solubility in the polar solvents used.
- The different OPMFs exhibited different pHs in the polar solvents tested.

Further work

- Carry out complementary structural, thermal and mechanical analyses on the prepared films.
- Identify possible fillers that could strengthen the prepared films.
- Identify possible applications of the prepared films.