

Supplementary Materials: Hydrogel Delivery System Containing *Calendulae flos* Lyophilized Extract with Chitosan as a Supporting Strategy for Wound Healing Applications

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Table S1. Statistical assay of linear plots of the chlorogenic acid and the narcissin, determined by the UHPLC-DAD method.

Parameter	Chlorogenic Acid		Narcissin	
Linearity: $y = ax + b$				
$a \pm S_a$	0.3963 \pm 0.0025		0.1235 \pm 0.0050	
$b \pm S_b$	Insignificant		insignificant	
correlation coefficient (r)	0.9999		0.9994	
Limit of detection (LOD): LOD = 3 SD/a ($\mu\text{g mL}^{-1}$)	0.63		10.64	
Limit of quantification (LOQ): LOQ = 10 SD/a ($\mu\text{g mL}^{-1}$)	1.92		32.26	
Range of linearity ($\mu\text{g mL}^{-1}$)	10–100		10–250	
Precision, RSD				
	20 ($\mu\text{g mL}^{-1}$)	1.42	100 ($\mu\text{g mL}^{-1}$)	0.41
	40 ($\mu\text{g mL}^{-1}$)	0.56	150 ($\mu\text{g mL}^{-1}$)	0.67
	60 ($\mu\text{g mL}^{-1}$)	1.31	200 ($\mu\text{g mL}^{-1}$)	1.40
Intra-day, RSD				
	20 ($\mu\text{g mL}^{-1}$)	1.80	100 ($\mu\text{g mL}^{-1}$)	0.96
	40 ($\mu\text{g mL}^{-1}$)	0.75	150 ($\mu\text{g mL}^{-1}$)	1.44
	60 ($\mu\text{g mL}^{-1}$)	1.43	200 ($\mu\text{g mL}^{-1}$)	1.71

where SD is the mean of standard deviations of determinations in the lower range of linearity and a is the directional coefficient of the plotted linear function, S_a standard deviation of the slope, S_b standard deviation of the intercept, t calculated values of Student's t test, $t_{\alpha, f} = 2.228$ critical values of Student's t test for degrees of freedom $f = 10$ and significance level $\alpha = 0.05$.

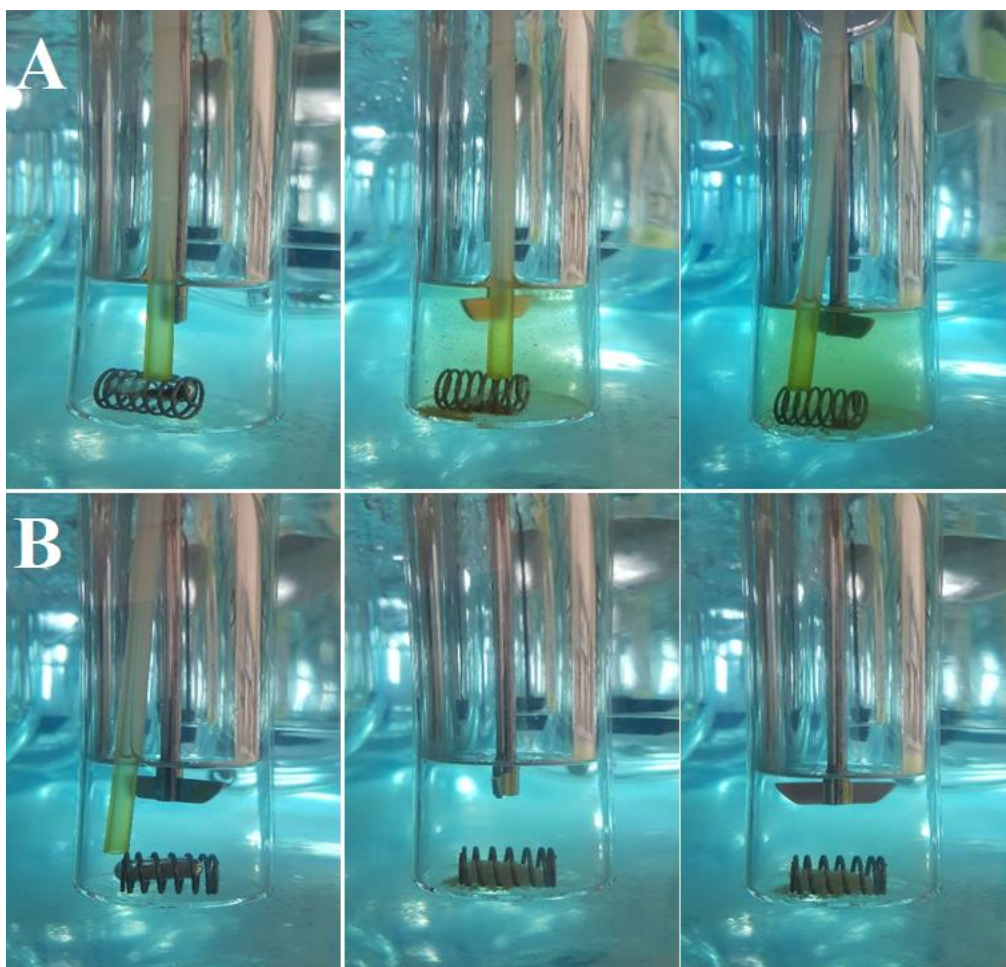


Figure S1. Dissolution studies of *Calendulae flos* lyophilized extract (A) and chitosan (80/500) delivery system with *Calendulae flos* lyophilized extract in weight ratio 1:1 (*w/w*) (B) in time 0 min, 30 min and 180 min by using a standard paddle Agilent 708-DS Dissolution Apparatus with a 150-mL phosphate buffer at pH 5.5 at 32 ± 0.5 °C.

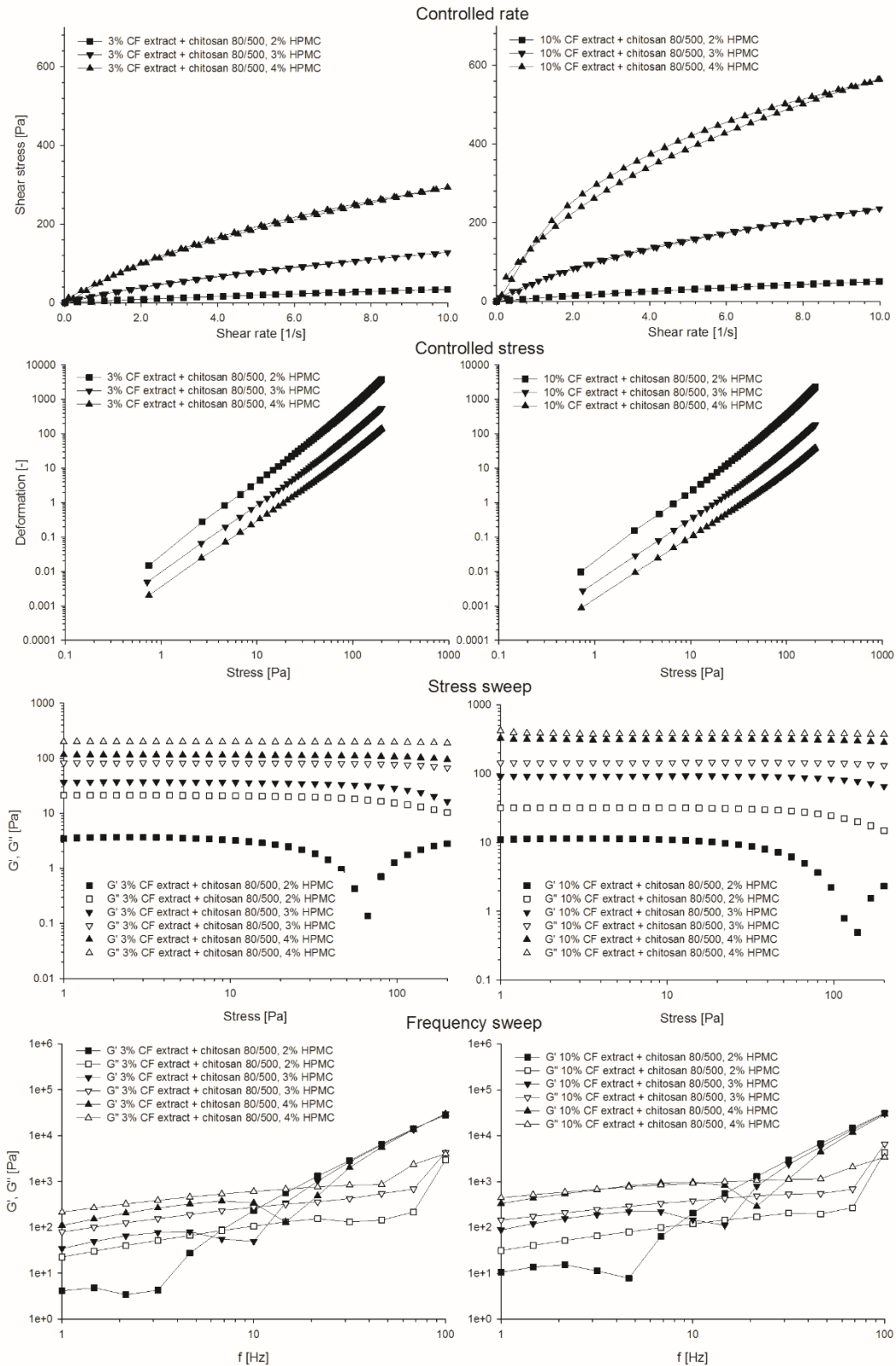


Figure S2. Rheological plots obtained for the hydrogel samples in steady shear tests (controlled rate and controlled stress) and oscillatory tests (stress and frequency sweep).