Electronic Supplementary Material (ESI) for RSC Advances.

Table S1 Reaction rate constants and their correlation coefficients under different operating conditions

No.	ALR	BCR	O_2	Air	N_2	UV	ZnFe/BC (g/L)	PMS (mmol/L)	pH_0	C_0 (mg/L)	BC (g/L)	TBA (mol/L)	EtOH (mol/L)	BQ (mol/L)	NaN_3 (mol/L)	$K_2Cr_2O_7$ (mol/L)	EDTA (mol/L)	k (min^{-1})	r^2
1	√			√		√		5	6	30								0.025	0.969
2	√			√				5	6	30	0.5							0.0051	0.981
3	√			√			0.5	5	6	30								0.018	0.991
4	√			√		√	0.5	5	6	30								0.082	0.991
5	√			√		√	0.5	1	6	30								0.0061	0.943
6	√			√		√	0.5	3	6	30								0.036	0.998
7	√			√		√	0.5	5	6	30								0.082	0.991
8	√			√		√	0.5	7	6	30								0.083	0.982
9	√			√		√	0.1	5	6	30								0.013	0.991
10	√			√		√	0.3	5	6	30								0.025	0.993
11	√			√		√	0.5	5	6	30								0.082	0.991
12	√			√		√	0.7	5	6	30								0.091	0.968
13	√			√		√	0.5	5	3	30								0.084	0.986
14	√			√		√	0.5	5	6	30								0.082	0.991
15	√			√		√	0.5	5	7	30								0.080	0.990
16	√			√		√	0.5	5	10	30								0.069	0.989
17	√			√		√	0.5	10	6	30		0.1						0.058	0.998
18	√			√		√	0.5	10	6	30			0.1					0.038	0.999
19	√			√		√	0.5	10	6	30				0.1				0.028	0.980
20	√			√		√	0.5	10	6	30					0.1			0.036	0.989
21	√			√		√	0.5	10	6	30						0.1		0.029	0.998
22	√			√		√	0.5	10	6	30							0.1	0.022	0.990

23	√		√			0.5	5	6	30		0.115	0.958
24	√			√		0.5	5	6	30		0.082	0.991
25	√				√	0.5	5	6	30		0.075	0.979
26		√		√		0.5	5	6	30		0.030	0.981

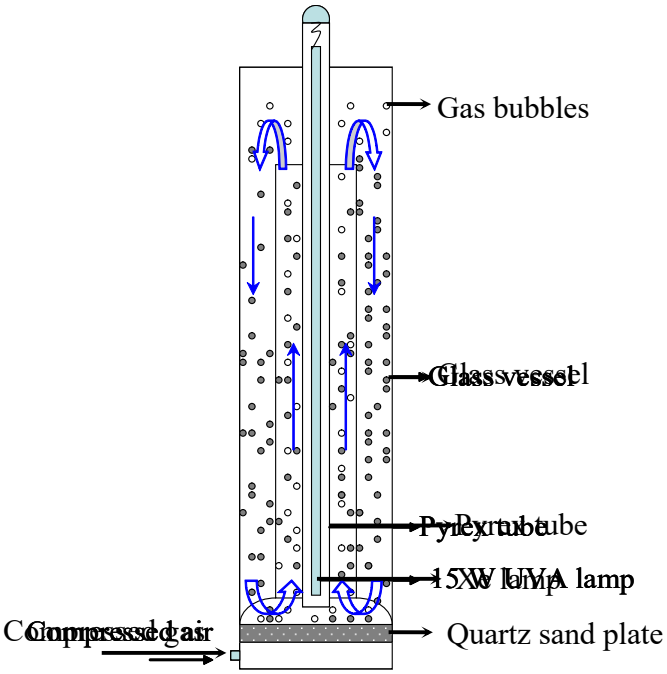

Fig. S1 The experimental set up