

*Supporting Information*

# A Novel Thiosemicarbazide-Based Fluorescent Chemosensor for Hypochlorite in Near-Perfect Aqueous Solution and Zebrafish

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**Table S1.** Fluorescent turn-off chemosensors for recognizing hypochlorite in aqueous solutions.

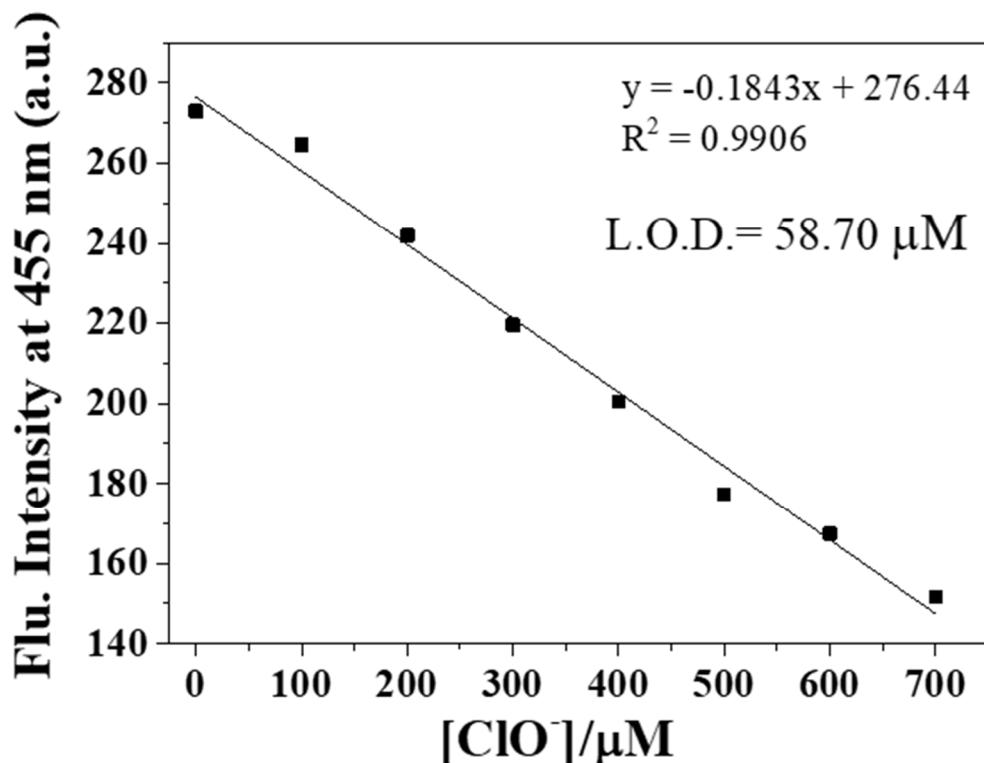
No .	Sensor	Fluorescence response	Detection limit	Ref.
1	naphthalimide derivative	Turn off	0.674 μM	[1]
2	BODIPY derivative	Turn off	No data	[2]
3	tetraphenylethylene derivative	Turn off	0.312 μM	[3]
4	thiourea derivative	Turn off	0.43 μM	[4]
5	naphthalimide derivative	Turn off	1.6 μM	[5]
6	coumarin derivative	Turn off	2.2 μM	[6]
7	acridine derivative	Turn off	7.65 μM	[7]
8	thiosemicarbazide derivative	Turn off	58.70 μM	This work

## References

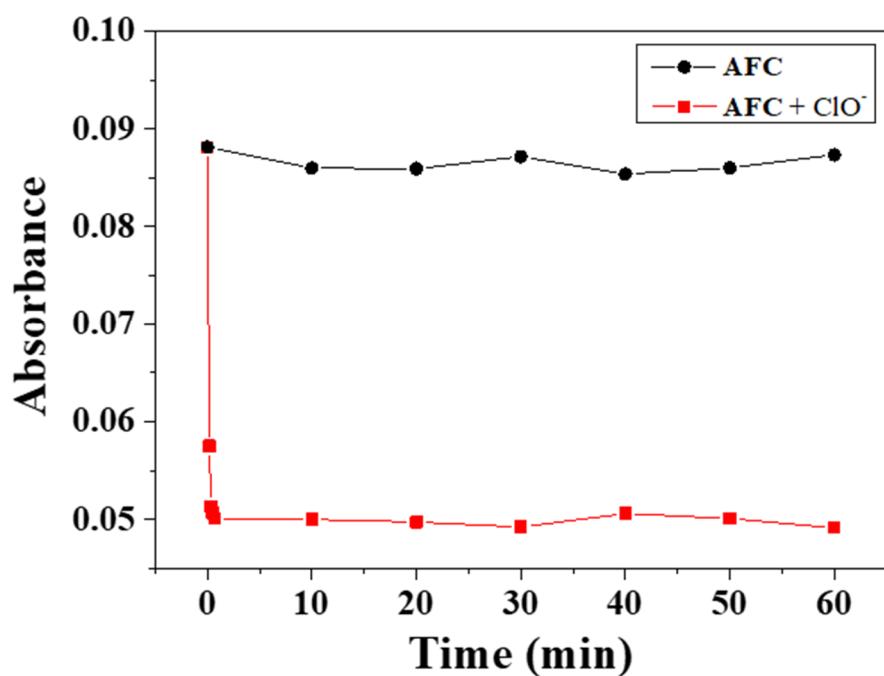
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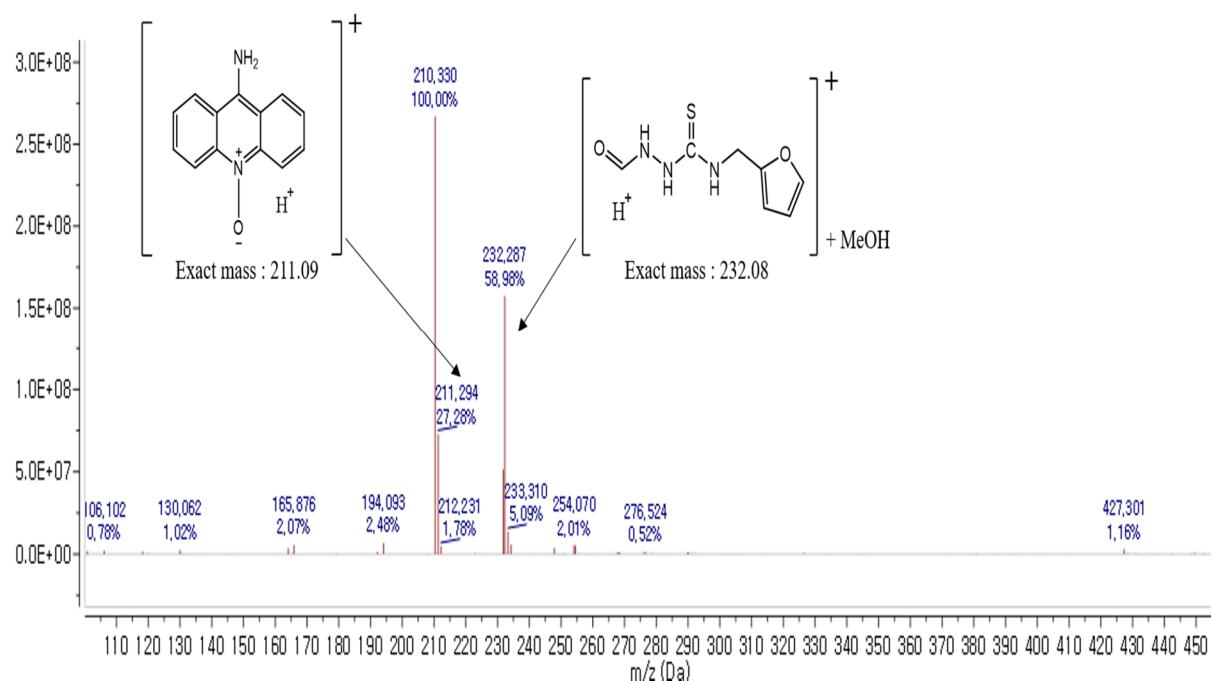
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**Fig. S1** Determination of the detection limit of AFC ( $10 \mu\text{M}$ ) for  $\text{ClO}^-$  based on the change of intensity at 455 nm.



**Fig. S2** The time-dependent UV-vis change (400 nm) of AFC (10  $\mu$ M) with/without ClO<sup>-</sup> (290 equiv).



**Fig. S3** Positive-ion ESI-mass spectrum of AFC (10  $\mu$ M) upon addition of NaClO (200 equiv).

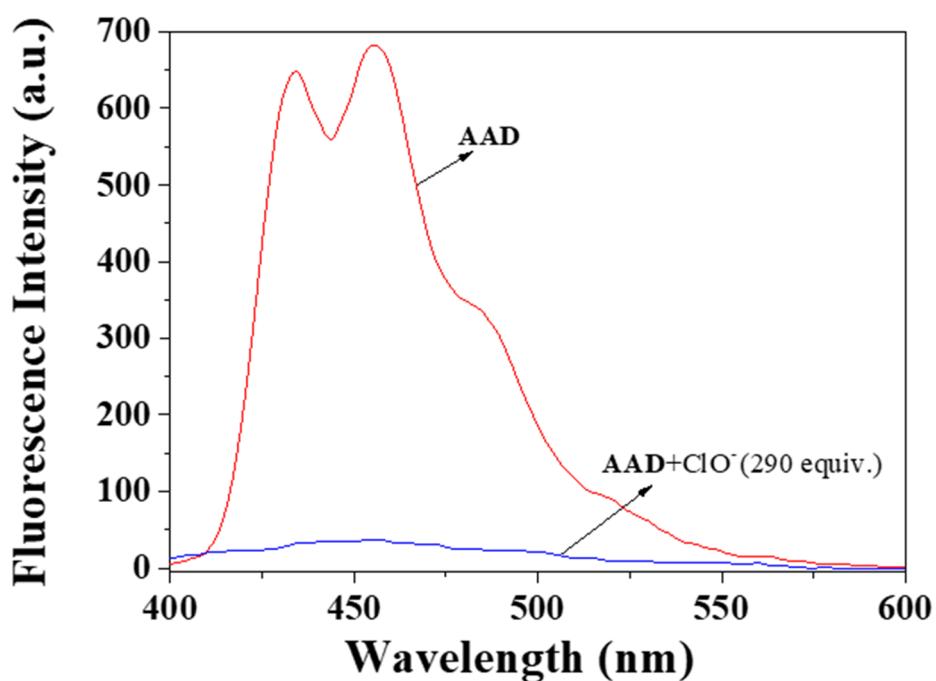


Fig.S4 Fluorescent change of AAD ( $1 \times 10^{-5}$  M) with/without ClO<sup>-</sup>.

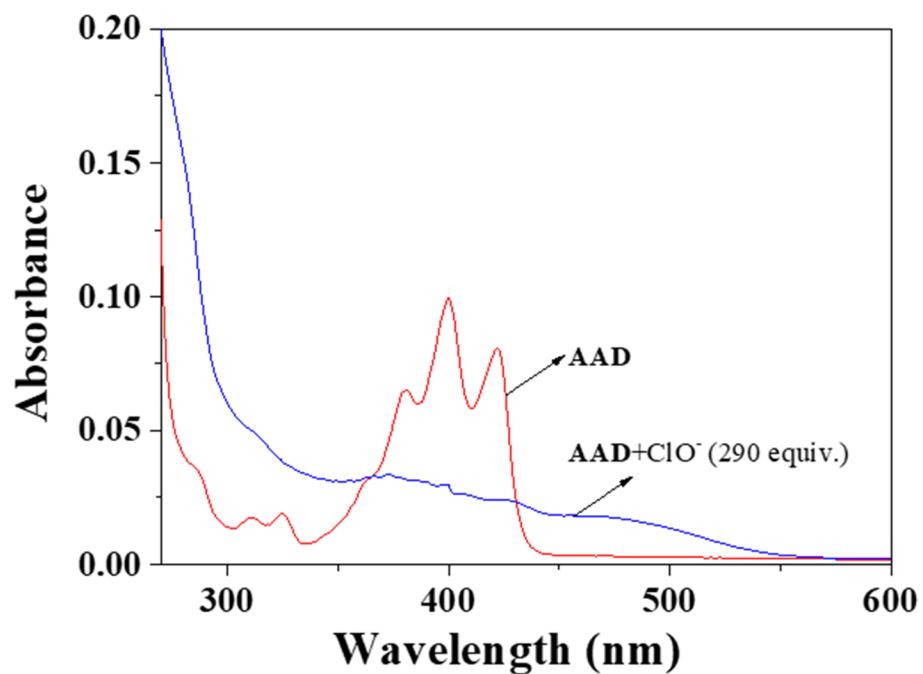
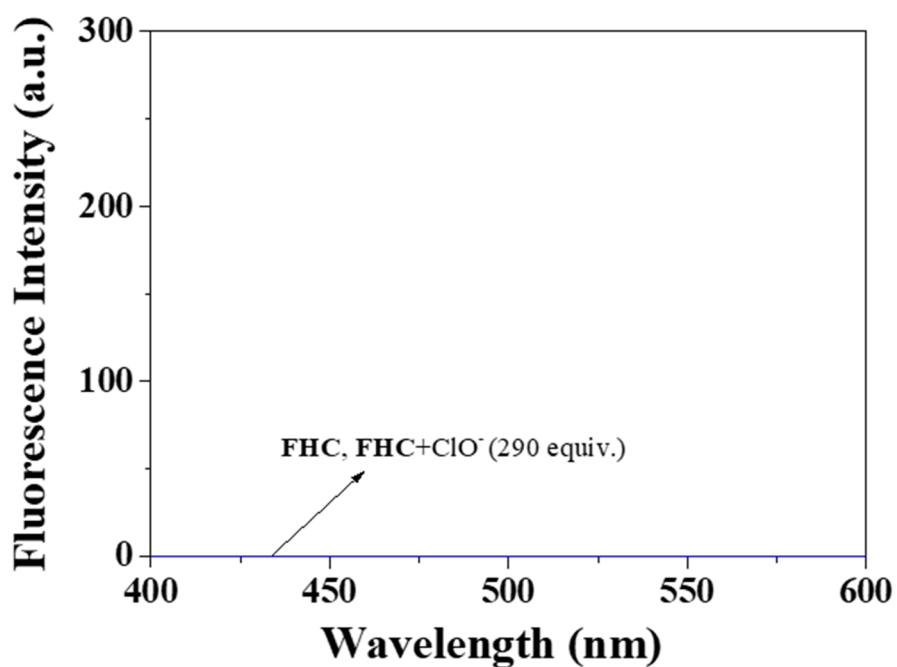
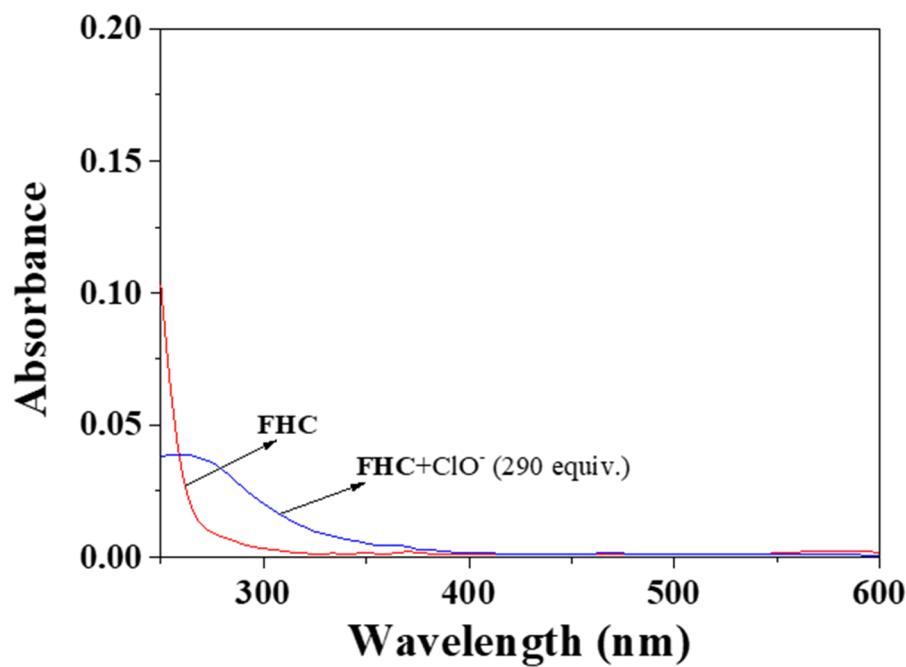


Fig.S5 UV-vis change of AAD ( $1 \times 10^{-5}$  M) with/without ClO<sup>-</sup>.



**Fig.S6** Fluorescent change of FHC ( $1 \times 10^{-5}$  M) with/without ClO<sup>-</sup>.



**Fig.S7** UV-vis change of FHC ( $1 \times 10^{-5}$  M) with/without ClO<sup>-</sup>.