

Fig. S1 TEM image of a  $\text{Sr}_3\text{NaSbO}_6:0.002\text{Bi}$  particle.

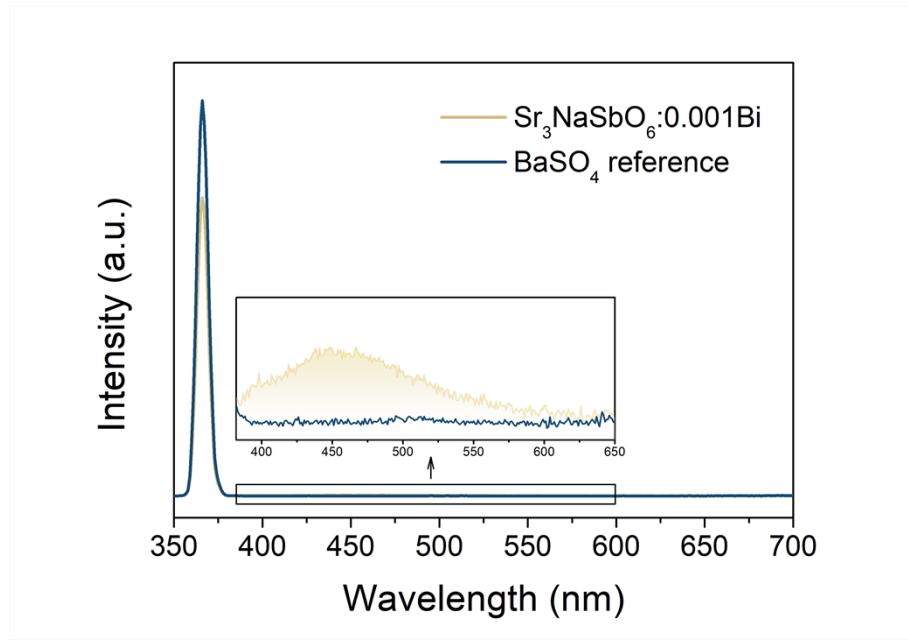


Fig. S2 Excitation line of  $\text{BaSO}_4$  and emission spectrum of  $\text{Sr}_3\text{NaSbO}_6:0.001\text{Bi}$ .

Table S1 The bond distance and bond energy parameters of the central atom in  $\text{Sr}_3\text{NaSbO}_6$  with Bi ions in the Sr and Na positions. The unit of bond energy is  $\text{kcal}\cdot\text{mol}^{-1}$ .

Central atom	Corrdination atom	d / Å	$E_{\text{M-O}}$	$E_{\text{Bi-O}}$	$\Delta E_{\text{Bi}}$
Sr	O1	2.8804	8.25	5.50	/
	O2	2.6189	16.73	11.15	/
	O3	2.6205	16.65	11.10	/
	O4	2.8804	8.25	5.50	/
	O5	2.5223	21.71	14.48	/
	O6	2.5223	21.71	14.48	/
	O7	2.6205	16.65	11.10	/
	O8	2.6190	16.72	11.15	/
Average	/	/	15.83	10.56	5.27
Na	O1	2.3951	21.50	10.21	/
	O2	2.3951	21.50	10.21	/
	O3	2.3951	21.50	10.21	/
	O4	2.3951	21.50	10.21	/
	O5	2.3951	21.50	10.21	/
	O6	2.3951	21.50	10.21	/
	Average	/	/	21.50	10.21
					11.29

Table S2 The CIE coordinates of  $\text{Sr}_3\text{NaSbO}_6:0.001\text{Bi}$  at different operating temperatures ( $\lambda_{\text{ex}} = 349 \text{ nm}$ ).

	x	y
298	0.1749	0.1391
323	0.1757	0.1454
348	0.1764	0.1475
373	0.1771	0.1506
398	0.1789	0.1561
423	0.1804	0.1597
448	0.1828	0.1649
473	0.1866	0.1724
498	0.1908	0.1793
523	0.1950	0.1855
548	0.1981	0.1905
573	0.1999	0.1938