## Table 1

## Measurements and estimates of the average energy needed to produce a scintillation photon, $W_{ph}(eV)$ in liquid Xe

Liquid rare gas	Relativistic electrons	α-particles	Relativistic heavy particles $(W'_{ph} (eV))$
Ar	$25.1 \pm 2.5$	$27.5 \pm 2.8$	$19.5 \pm 2.0$
Xe	$23.7 \pm 2.4$ ( < 35) <sup>a</sup> (67 ± 22) <sup>e</sup> (29.6 ± 1.8) <sup>e</sup> (14.2) <sup>f</sup> , (12.5,12.3) <sup>g</sup> (42 ± 0.6) <sup>h</sup>	$\begin{array}{c} 19.6 \pm 2.0 \\ (16.3 \pm 0.3)^{\rm b} \\ (39.2)^{\rm d} \end{array}$	$14.7 \pm 1.5$
NaI(Tl)	$(17.2 \pm 0.4, 16.5 \pm 0.4)^{i}$		

<sup>a</sup>Ref. [27]; <sup>b</sup>Ref. [28]; <sup>c</sup>Ref. [29]; <sup>d</sup>Ref. [30]; <sup>e</sup>Ref. [31]; <sup>f</sup>Ref. [32]; <sup>g</sup>Ref. [33]; <sup>h</sup>Ref. [34]; <sup>i</sup>Refs. [35,36].