Table 23: Domeisen 2013[135]

Study (ref id)	Domeisen 2013[135]
Aim	To describe the most pertinent phenomena in identifying whether a person is in the last hours or days of life.
Population	n=252 Healthcare professionals and lay care persons/volunteers who were experienced in palliative care and care of those in the last hours and days of life across 9 countries
Setting	Various settings
Study design	Three stage Delphi. Each stage consisted of development of the questionnaire by a synthesis group from the 9 participating countries made up of nurses, physicians, psycho-social-spiritual professionals, volunteers and researchers. This was then distributed among the target population, and the results reviewed and synthesised, and the output brought forward to next stage. Due to lay persons comments in the 2nd round they were not included in the 3rd round (felt required clinical experience). Questions were: • Please list a maximum of 4 phenomena, observations or perceptions which seem important to you while trying to identify that somebody will die within the next hours or days.

		• Do you agree that this phenomenon is important when identifying or recognising the last hours or days of life?
		• Please rate the following phenomena in terms of clinical relevance to predict that someone will die within the next few hours/days,
Methods and analysis		The participants were asked to rate the last 2 questions on 4 point Likert scales. These were then dichotomised in the analysis.
		The results from the survey were analysed by the group of clinical experts, and coded by 3 researchers and categorised. A consensus level of 50% was predefined as significant.

(52.6)	Category	Phenomena with high relevance to recognising dying (% who chose relevant or highly relevant
	Breathing	Death rattle (82.1%)
		Changes in breathing rhythm (66.7%)
		Changes in breathing (50%)
		Changes in breathing patterns (64.1%)
	Consciousness/cognition	Irreversible deterioration of consciousness (62.8%)
		Comatose (61.5%)
		Semi-comatose (52.2%)
	Emotional state	Restlessness (50.7%)
	General deterioration	Rapid degradation of general condition (60.3%)
		Organ failure (65.4%)
		Irreversible status (56.5%)
	Intake of fluid, food, other	No fluid or food intake (69.9%)
		Cannot drink (52.65)
		Swallowing impossible (55.1%)
	Non-observations/expressed opinions/other	Intuition of professionals, gut feeling (57.7%)
	Skin	Peripheral shut down (58%)
		Cold extremity (53.6%)
		Marble- like skin (52.6%)
		Pale around nose and mouth (59.4%)

Limitations	Although a large Delphi n=252 in the initial stage only n=36 and n=78 participated in the second and third stages of the Delphi. The study reports a 100% response rate for rounds 1 and 2 and 72% response rate in round 3. It is unclear how the subset of the group was formed for round 2 and 3, given not all those who contributed in round 1 were included.

Applicability of evidence	Direct population, and good involvement of a wide variety of those important to the care in the last days of life.