PRACTICE AND ETHICS OF NUTRITIONAL SUPPORT IN MEDICAL PATIENTS Supporting information

This guideline has been prepared with reference to the following:

NICE. Nutrition support for adults: oral nutrition support, enteral tube feeding and parenteral nutrition. 2017. London. NICE

https://www.nice.org.uk/guidance/cg32

McClave SA, Taylor BE, Martindale RG et al. Guidelines for the Provision and Assessment of Nutrition Support Therapy in the Adult Critically III Patient: Society of Critical Care Medicine (SCCM) and American Society for Parenteral and Enteral Nutrition (A.S.P.E.N.). JPEN J Parenter Enteral Nutr. 2016;40:159-211

http://journals.sagepub.com/doi/full/10.1177/0148607115621863 *see 2021 update @ https://aspenjournals.onlinelibrary.wiley.com/doi/10.1002/jpen.2267

Is percutaneous endoscopic gastrostomy (PEG) safer than nasogastric tube (NGT) feeding? A Cochrane systematic review of 11 RCTs (Gomes, 2015) found that PEG was associated with a lower probability of intervention failure (RR 0.18, 95% CI 0.05 to 0.59), suggesting the endoscopic procedure may be more effective and safe compared with NGT. There is no significant difference in mortality rates between comparison groups, or in adverse events, including pneumonia related to aspiration (RR 0.70, 95% CI 0.46 to 1.06).

Gomes CA, Lustosa SA, Matos D, et al. Percutaneous endoscopic gastrostomy versus nasogastric tube feeding for adults with swallowing disturbances. Cochrane Database of Systematic Reviews 2015. Art. No.: CD008096 http://onlinelibrary.wiley.com/doi/10.1002/14651858.CD008096.pub4/full

Evidence Level: I

There is no evidence that tube feeding is of benefit in patients with end-stage dementia? A 2020 systematic review of 12 observational studies found that that tube feeding is associated with increased mortality rate and possible tube-related complications, but not improvements with prolonging survival days and nutritional status (Lee, 2020). Patients with advanced dementia with tube feeding were associated with significantly higher mortality rate [odds ratio (OR) 1.79; 95% confidence interval (CI) 1.04 to 3.07; P = .03]. PEG tube feeding was associated with a significantly higher risk of pneumonia (OR 3.56; 95% CI 2.32 to 5.44; P < .001) and pressure sore (OR 2.25; 95% CI 1.92 to 2.63; P < .001).

A Cochrane systematic review (Sampson, 2009) found no RCTs to assess. Seven observational controlled studies were identified, of which six assessed mortality. The other study assessed nutritional outcomes. There was no evidence of increased survival in patients receiving enteral tube feeding. None of the studies examined quality of life and there was no evidence of benefit in terms of nutritional status or the prevalence of pressure ulcers.

A position statement by the American Geriatrics Society (2014) recommended that "When eating difficulties arise, feeding tubes are not recommended for older adults with advanced dementia. Careful hand feeding should be offered because hand feeding has been shown to be as good as tube feeding for the outcomes of death, aspiration pneumonia, functional status, and comfort. Moreover, tube feeding is associated with agitation, greater use of physical and chemical restraints, healthcare use due to tube-related complications, and development of new pressure ulcers." In 2021 the European Society of Gastrointestinal Endoscopy also recommended refraining from PEG placement in patients with advanced dementia (Arvanitakis, 2021).

Arvanitakis M, Gkolfakis P, Despott EJ et al. Endoscopic management of enteral tubes in adult patients - Part 1: Definitions and indications. European Society of Gastrointestinal Endoscopy (ESGE) Guideline. Endoscopy. 2021;53:81-92

Lee YF, Hsu TW, Liang CS et al. The Efficacy and Safety of Tube Feeding in Advanced Dementia Patients: A Systemic Review and Meta-Analysis Study. J Am Med Dir Assoc. 2021;22: 357-63

American G, Committee 2014. American Geriatrics Society feeding tubes in advanced dementia position statement, Jnl Am Ger Soc. 2014. 62;1590 http://onlinelibrary.wiley.com/doi/10.1111/jgs.12924/full

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Sampson EL, Candy B, Jones L. Enteral tube feeding for older people with advanced dementia. Cochrane Database of Systematic Reviews 2009, Issue 2. Art. No.: CD007209 http://onlinelibrary.wiley.com/doi/10.1002/14651858.CD007209.pub2/full

Evidence Level: III

What defines a patient's legal capacity to give consent? This is defined by the Mental Capacity Act 2005: http://www.legislation.gov.uk/ukpga/2005/9/contents

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