Palliative Care

Care Management Guidelines

Fatigue, Anorexia and Cachexia

Department of Health and Human Services

Tasmania
Explore the possibilities

Fatigue, Anorexia and Cachexia

Introduction

- These guidelines concern the management of fatigue, anorexia and cachexia for people who have a progressive life-limiting illness where death is the anticipated eventual outcome.
- Whilst investigation and definitive active treatment of the underlying disease should always be considered and may be essential management, in-depth details are not given here.

Key Principles

- Fatigue is one of the commonest symptoms in terminal illness.
- It is ranked as one of the most important symptoms affecting patient comfort and function.
- When associated with cachexia and anorexia, fatigue is associated with:
  - increased mortality and morbidity; and
  - reduced response to therapy.
- A detailed history and examination is essential.
- Appropriate treatment of reversible causes is required.
- Dexamethasone is not first line therapy.
- These are difficult symptoms to treat:
  - Multidisciplinary assessment and management may be helpful: dietician to optimise dietary intake, physiotherapy to explore exercise options, occupational therapy to adapt activities of daily living. There is some evidence to support selected pharmacological intervention (see below).

Assessment

- Fatigue may present as:
  - a generalised muscular weakness, loss of endurance and exhaustion;
  - poor concentration or mentation;
  - reduced attention to environmental or social stimuli; or
  - depressed or anxious mood.

History

- Physical examination and appropriate investigations.
- Identify all factors that may be contributing to the symptom, particularly
  - disease activity
  - disease complications
  - GI complications e.g. nausea, poor gastric emptying, medication side effects
  - haematology e.g. anaemia
  - biochemistry e.g. hypercalcaemia
  - hormonal factors
  - contributing co-morbidities

    - iatrogenic factors such as specific adverse drug reactions
    - disuse atrophy
    - nutritional deficiencies
    - depression or other mood disorders.
- Assessment of other symptoms contributing to patient discomfort.

Useful Questions When Assessing Fatigue

- *Onset*: Has it come on suddenly or is has it been long term?
- *Exacerbating or relieving factors:* Does anything make it better? Worse?
- Are there other symptoms causing discomfort? Are you losing weight? How quickly?
- *Quality:* What does it feel like? Can you compare it to anything you've had before?
- *Severity:* How do you rate your fatigue? At best? At worst? On average? How much does it bother you? What is your exercise tolerance like?
- *Understanding and Impact:* Describe your present daily routine? What does the fatigue stop you doing? How have you adjusted? How are you sleeping? What do you think is causing the fatigue? What is your goal for the fatigue? Are there any other views or feelings about the fatigue that are important to you and your family?

Diagnosis

- Clinical features of malignant asthenia/fatigue/anorexia/cachexia:
    - significant fatigue, diminished energy, or increased need to rest, disproportionate to any recent change in activity level
    - generalized weakness or limb heaviness
    - poor concentration or attention
    - decreased motivation or interest to engage in usual activities
    - insomnia or hypersomnia
    - experience of sleep as unrefreshing
    - perceived need to struggle to overcome inactivity
    - marked emotional lability
    - difficulty completing daily tasks
    - short-term memory disturbance
    - post exertional malaise lasting hours
    - the symptoms cause clinically significant distress or impairment in social and/or occupational functioning.
- The symptoms are not primarily a consequence of co-morbid psychiatric disorders such as major depression, somatization disorder, somatoform disorder, or delirium.

Pathophysiology of Fatigue

- Fatigue may be due to:
    - Primary factors e.g. reduced rest and sleep
    - Secondary factors associated with:
        - disease activity - metabolism
        - effects of disease on other systems eg anaemia

        - systemic inflammatory response and production of pro-inflammatory cytokines
        - dysregulation of hypothalamic-pituitary-adrenal axis
        - co-morbidities.
- Chronic non-malignant and malignant illness results in:
    - loss of lean body mass in response to reduced exercise and changes in regulation of muscle turnover
    - changes in gonadal axis leading to hypogonadism
    - increased basal metabolic rate
    - reduced nutritional intake, absorption and metabolism
- These changes are thought to be mediated by the increased production of inflammatory mediators such as:
    - Interleukin 1 alpha
    - Interleukin 6
    - Tumour necrosis factor alpha.
- There is emerging data to suggest that opioid induced endocrinopathy may contribute to fatigue.

Management

Goals of Management

- Identify factors that may be contributing to the fatigue
- Treat disease if possible and acceptable
- Treat reversible causes or contributing factors
- Initial aim should be functional improvement or maintenance of the patient's current state **not** complete elimination of the symptom
- Palliation of symptoms if unable to modify situation
- Assist the patient and family in adapting to the situation and making lifestyle adjustments

Management - Non Pharmacological

- Control pain and other distressing symptoms.
- Exclude depression and malabsorption such as pancreatic insufficiency without enzyme replacement.
- Maintain nutrition and exercise as able.
- Promote gentle activity as tolerated.
- Sleep promotion including relaxation, avoidance of stimulants and improvements to the sleeping environment.
- Energy conservation strategies to conserve energy use for priority tasks.
- Psychological support, counselling, education and monitoring.
- Frequent reviews of management strategy and contributing factors. A symptom inventory tool such as the Edmonton Symptom Assessment Scale (ESAS) may be useful.

Management - Pharmacological

Remove or reduce the dose of drugs contributing to symptoms.

- Corticosteroids:

    - evidence for promotion of several weeks of well being and appetite stimulation but:
        - catabolic effects may contribute to weakness, especially proximal myopathy
        - psychological effects may disrupt sleep and emotional stability
        - long term complications: Glucose metabolism, weight gain, skin atrophy, ulceration risk etc
        - if commenced, for example for a specific event, there must be a plan to monitor, wean and/or cease use
        - in general it should be used for those with prognosis of 1-2 months or as short course
- Methylphenidate:
    - use is controversial
    - predominantly used to reverse opiate induced sedation
    - can be used to relieve depression
    - poor evidence of benefit in fatigue
- Megestrol acetate:
    - has been demonstrated to have a positive effect on appetite and weight gain in patients with cancer. Weight gain was fat, as with steroids
- Omega 3 fatty acids:
    - Cochrane review states evidence is not clear; studies suggest benefit from sub-groups that get 2gms or more per day in the setting of inoperable lung and pancreatic cancer
- Non Steroidal Anti Inflammatory Agents (NSAIDs):
    - may assist in decreasing inflammatory response
- Dronabinol
    - Cannabinoids have not been demonstrated to have activity against cancer related anorexia cachexia syndrome in patients advanced cancer

Consultation and Advice

- Multidisciplinary assessment required
- Anorexia/cachexia syndrome the main problem for a patient who otherwise appears to have a reasonable prognosis
- Carer stress, respite and support needs

Definitions of Terms

- **Fatigue:** Fatigue in advanced illness is an overwhelming, persistent feeling of tiredness or exhaustion where normal activity becomes an effort of the mind as well as the body. It is not proportional to activity and is not relieved by rest.
- **Asthenia**: Persistent progressive experience of increased lethargy, decreased cognitive capacity and reduced motivation secondary to life threatening illness.
- Note: The words asthenia and fatigue are often used interchangeably by health professionals. Asthenia is associated with anorexia and cachexia.
- **Anorexia**: Loss of desire to eat resulting in reduced nutritional intake secondary to chronic or malignant disease.
    - Anorexia presents as
        - lack of hunger

        - disinterest in food
        - early satiety & post-prandial fullness due to gastroparesis
        - altered taste and smell
        - learned food aversions.

      It is not anorexia nervosa as defined in psychiatry by DSM-IV

- **Cachexia**: Debilitating state of involuntary weight loss complicating malignant, chronic infectious and inflammatory diseases that contributes to increased morbidity and mortality
    - Cachexia presents as
        - loss of weight
        - sarcopoenia – loss of muscle mass
        - loss of body image – physical self.

Revision history and planned frequency

Endorsed September 2009

Next review September 2010