WCEDS

Swindon Education trust

Wiltshire Community Eating Disorder Service

Eating Disorders

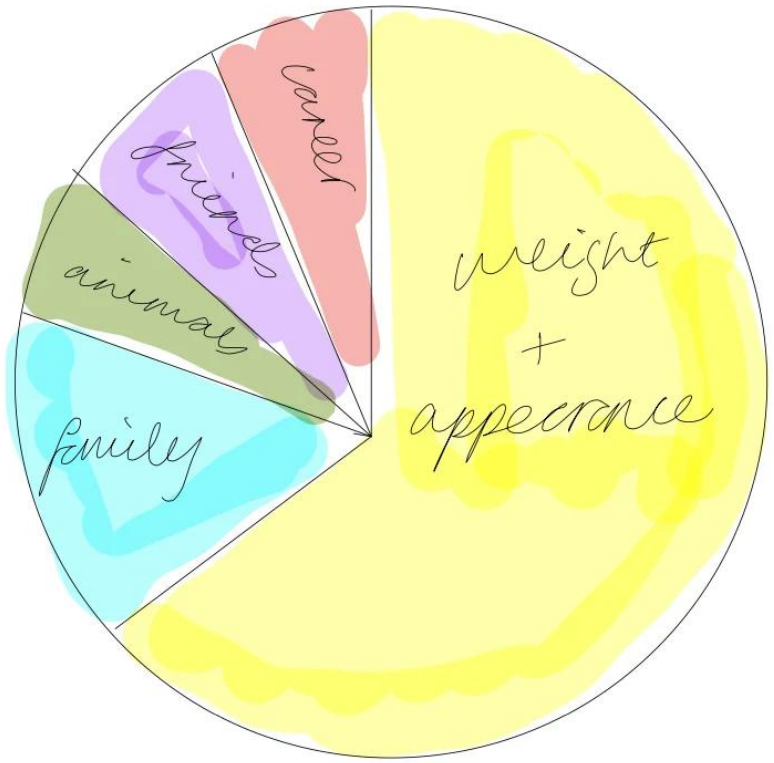
- Estimate that at least 1.25+ million people in the UK have an eating disorder.

- Eating disorders are complex mental illnesses affecting people of all ages, genders, ethnicities and backgrounds - anyone can develop one – highest mortality rate of all mental illness – physical and mental effects.

- People with eating disorders use disordered eating behaviour as a way to cope with difficult situations or feelings. This behaviour can include limiting the amount of food eaten, eating very large quantities of food at once, getting rid of food eaten through unhealthy means (e.g. making themselves sick, misusing laxatives, fasting, or excessive exercise), or a combination of these behaviours.

- Eating disorders are not all about food itself, but about feelings. The way the person treats food may make them feel more able to cope, or may make them feel in control, though they might not be aware of the purpose this behaviour is serving.

Feeding and Eating Disorders ICD-11

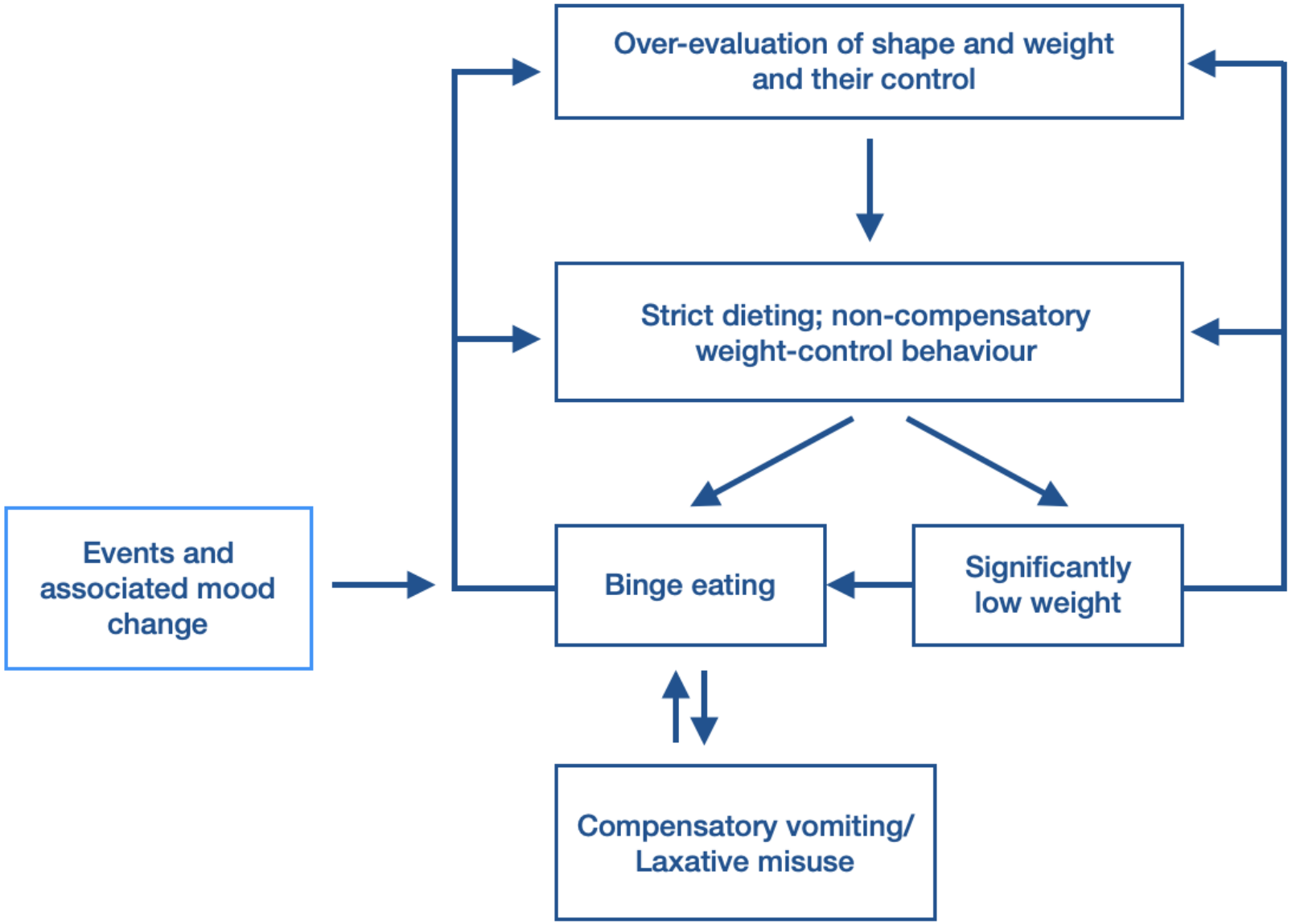


- **Anorexia Nervosa**
  - BMI <18.5 or weight loss of >20% body weight
  - Failure to gain weight as expected in CYPs
  - Persistent pattern of restricted eating associated with extreme fear of weight gain
  - May also aim to increase energy expenditure
  - Low body weight overvalued and central to self-evaluation

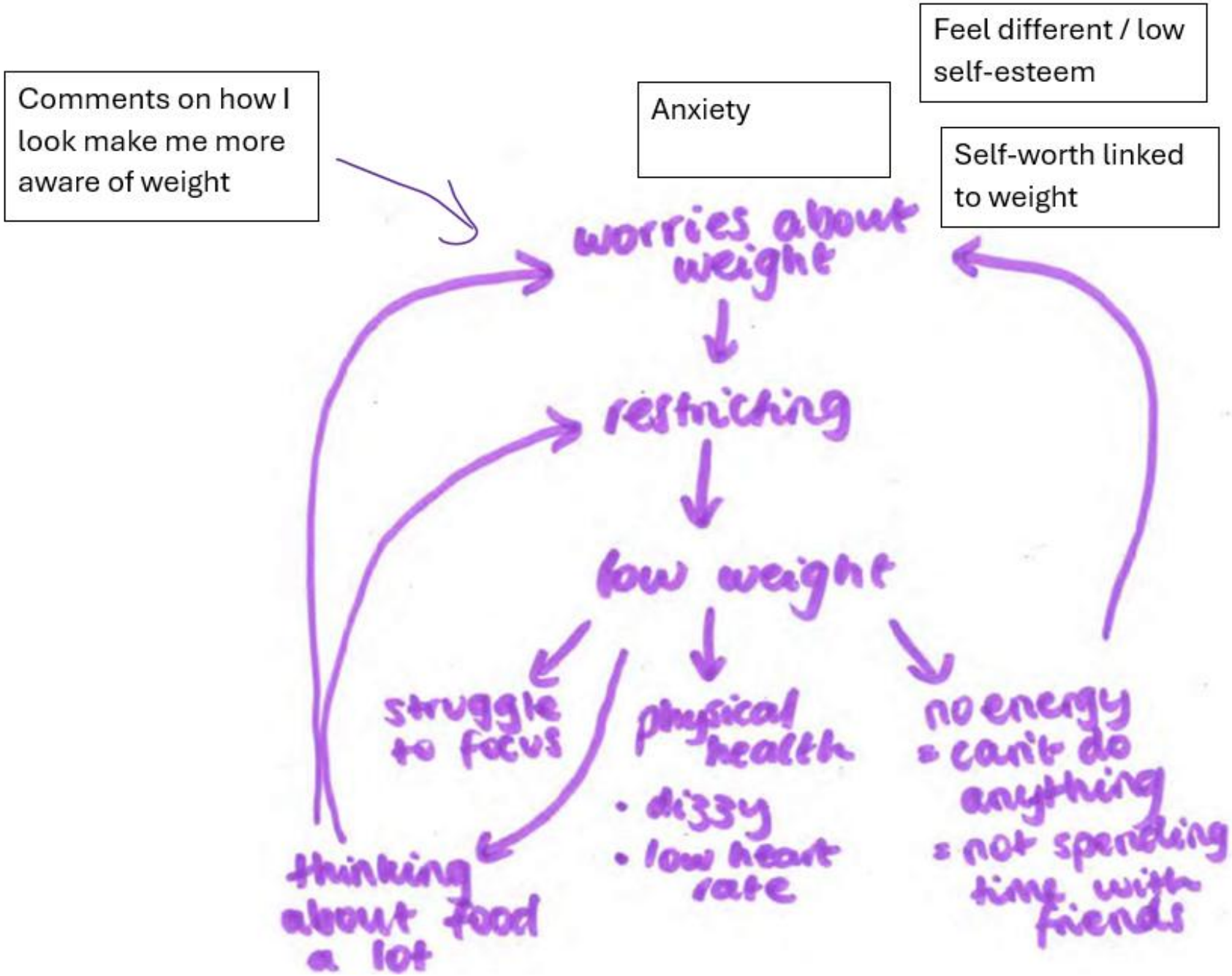
- **Bulimia Nervosa**
  - Frequent, recurrent episodes of binge eating (at least once a week for over one month)
  - Perceived loss of control
  - Compensatory behaviours e.g., vomiting, laxative abuse, periods of starvation, use of medication, compulsive exercise
  - Preoccupation with body image and shape which influences self evaluation

- **Binge Eating Disorder**
  - Frequent, recurrent episodes of binge eating (at least once a week for three months)
  - Perceived loss of control
  - Binge eating episodes not regularly accompanied by compensatory behaviours
  - *preoccupation with body weight or shape

CBT-E Transdiagnostic Formulation



Fairburn (2008)


Comments on how I look make me more aware of weight
Anxiety
Feel different / low self-esteem
Self-worth linked to weight
worries about weight
restricting
low weight
struggle to focus
physical health
• dizzy
• low heart rate
no energy = can't do anything
= not spending time with friends
thinking about food a lot

Feeding and Eating Disorders ICD-11

- **Avoidant restrictive food intake disorder**
  - Avoidance or restriction of food intake that results in either or both of the following:
    - Significant weight loss or nutritional deficiency
    - Significant impairment in personal, family, social, educational, occupational or other important areas of functioning
  - Pattern of eating NOT based on distorted body image and weight concerns

Disordered eating

- Depression – lack of interest or motivation to self care
- Physical health conditions – pain/sickness/nausea
- Phobias – contamination – emetophobia
- Dementia - neglect
- Learned behaviour – environmental – from caregivers
- Society/culture – clean eating
- Emotional and self regulation / RISH – next slide

RISH Restrictive Intake self -harm

- RISH is a formulation driven term which aims to describe the specific subset of patients who present with restricted intake (both foods and fluids) as a method of self-harm. The term self-harm encompasses harm that occurs when attempting to self regulate.
- We conceptualise RISH as one specific, individually named subset of disordered eating.
- RISH represents a specific eating distress requiring a tailored treatment strategy.
- Treating RISH as AN could lead to both psychological and medical deterioration. Although both present with food restriction, the underlying function and understanding of the food restriction is different.
- To avoid inadvertent harm caused by treatment (iatrogenic harm) clinicians need to understand the significance of psychological formulation and how this should guide treatment planning.

Comorbidity

Anxiety

Depression

Personality disorder

Particularly emotionally unstable PD

Self harm may increase with weight restoration

OCD or prominent obsessional symptoms

Substance misuse

Autism, ADHD

Comorbity

- For EDs in general, the most prevalent psychiatric comorbidities were anxiety (up to 62%), mood (up to 54%) and substance use and post-traumatic stress disorders (similar comorbidity rates up to 27%). The review also noted associations between specific EDs and non-suicidal self-injury, personality disorders, and neurodevelopmental disorders. EDs were complicated by medical comorbidities across the neuroendocrine, skeletal, nutritional, gastrointestinal, dental, and reproductive systems. Medical comorbidities can precede, occur alongside or emerge as a complication of the ED.

(Hamilton 2022 et al)

We joint work with other teams when patient as comorbidity, having comorbidity does not make ED work less effective. Depending on the driver for the eating disorder might make us consider what to focus on first.

E.g. Alcohol use/emotion regulation/trauma

“Anorexic thinking”

- **Lack of insight** – patients may not accept that they have a mental disorder. It is an **ego-syntonic** disorder.
- **Body image distortion** – patients believe they are fat and/or have an intense fear of becoming ‘fat’. This belief may be held with delusional intensity.
- **Cognitive impairment** – malnutrition
- Yet patients with all the above features may appear very plausible, as they are rational when not discussing the eating issues and may be premorbidly high functioning and wellbeing appears intact as they are using the eating disorder as a ‘amazing’ but maladaptive coping mechanism.

- Other physical health problems
- Compensatory behaviours – vomiting, laxatives etc, exercise, bingeing
- Self-harm/Suicidality
- Other risky behaviours – alcohol, drugs
- Compliance and engagement
- Capacity to consent to treatment
- Home situation
- BMI and weight
- Rate and extent of weight loss
- Blood results

Assessment of risks in ED

Physical Risk

- Low Risk
  - Investigations OK
  - Infrequent purging
  - BMI >17
- Medium Risk
  - Investigations in concern range
  - Purging >3x/week
  - BMI <15
- High Risk
  - BMI <14
  - Investigations in concern and alert ranges
  - Rapid weight loss >1kg/week
  - Purging >3x/day
  - other risk factors – diabetes, pregnancy, medication increasing QT interval

Useful information and initial physical tests

- Clinical history
- Weight, height, BMI
- BP, Pulse, temperature

- Bloods

most often see

  - *Low Hb, WCC, - low platelets of more concern*
  - *Low glucose*
  - *Low potassium – purging*
  - *Low sodium – fluid overload*
  - *Low albumin, protein*
  - *High LFTs – more concerning, can rise rapidly*

- ECG if on medication, BMI<15
- Also refer for DEXA if significant period at low weight

SYSTEM	Test or Investigation	Concern	Alert
Nutrition	BMI	<14	<12
	Weight loss per week	>0.5kg	>1.0kg
	Skin Breakdown	>0.1cm	>0.2cm
	Purpuric		+
Circulation	Systolic BP	<90	<80
	Diastolic BP	<70	<60
	Postural drop (sit –stand)	>10	>20
	Pulse Rate	<50	<40
	Extremities		Blue/ cold
Musculo-skeletal (squat Test Sit up test)	Unable to get up without using arms for balance	+	
	Unable to get up without using arms as leverage		+
	Unable to sit up without using arms as leverage	+	
	Unable to sit up at all		+
Temperature		<35C	<34.5
Bone Marrow	White blood count	<4.0	<2
	Neutrophil count	<1.5	<1.0
	Haemoglobin	<11	<9.0
	Acute Hb drop (MCV and MCH raised – no acute risk)		+
	Platelets	<130	<110
Salt /water balance	K+	<3.5	<3.0
	Na+	<135	<130
	Mg++	<0.7	<0.5
	PO4--	<0.8	<0.6
	Urea	>7	>10
Liver	Bilirubin	>20	>40
	Alkaline phosphatase	>110	>200
	Aspartate transaminase (AST)	>40	>80
	Alanine transaminase (ALT)	>45	>90
	GGT	>45	>90
Nutrition	Albumin	<35	<32
	Creatinine Kinase	>170	>250
	Glucose	<3.5	<2.5
ECG	Pulse rate	<50	<40
	Corrected QT intervals (QTC) msec		>450
	Arrhythmias		+

Effects of severe malnutrition

- **Heart muscle mass reduced – risk of heart failure or cardiac arrest. Risk of arrhythmias particularly if electrolytes are disturbed due to vomiting/laxative abuse**
- **Brain shrinkage – the cause of the cognitive deficits**
- **Bone marrow failure – resulting in anaemia, poor blood clotting and reduced resistance to infection.**
- **Hypothermia – loss of ability to regulate temperature**
- **Osteoporosis may be evident even in young patients, stress fractures**
- **Liver or renal failure**
- **Amenorrhea in females/low testosterone in men and longer term reduced fertility**

Appendix 3: Medical emergencies in eating disorders risk checklist for clinicians

Assessing

Does the patient have an eating disorder?

Yes: Anorexia nervosa- Bulimia nervosa- Other

Not sure: Request psychiatric review

Is the patient medically compromised?

- ☐ BMI <13 (adults); m%MBI <70% (under 18)?
- ☐ Recent loss of >1kg for 2 consecutive weeks?
- ☐ Acute food or fluid refusal/intake <400kcal per day?
- ☐ Pulse <40?
- ☐ BP low, BP postural drop >20mm, dizziness?
- ☐ Core temperature <35.5°C?
- ☐ Na <130mmol/L?
- ☐ K <3.0mmol/L?
- ☐ Raised transaminase?
- ☐ Glucose <3mmol/L?
- ☐ Raised urea or creatinine?
- ☐ Abnormal ECG?
- ☐ Suicidal thoughts, behaviours?

Is the patient consenting to treatment?

Yes:

No: Mental health assessment requested

Refeeding

High risk for refeeding syndrome?

- ☐ Low initial electrolytes
- ☐ BMI <13 or m%BMI <70%
- ☐ Little or no intake for >4 days
- ☐ Low WBC
- ☐ Serious medical comorbidities, e.g. sepsis

High risk? Management:

- **<20 kcal per kg per day**
- **Monitor electrolytes twice daily**
- **build up calories swiftly**
- **avoid underfeeding**

Lower risk? Management:

- **Start at 1,400–2,000kcal per day (50 kcal/kg/day) and build by 200 kcal/day, to 2,400kcal/day or more**
- **Aim for weight increase of 0.5–1kg/week**
- **Avoid underfeeding**

Monitoring

- ☐ Electrolytes (especially P, K, glucose)
- ☐ ECG
- ☐ Vital signs
- ☐ BMI

Managing

Are medical and psychiatric staff collaborating in care?

Yes:

No: Psych. consultation awaited

Are nurses trained in managing medical and psychiatric problems?

Yes

No and appropriately skilled staff requested/training in place

Are there behaviours increasing risk?

- ☐ Falsifying weight
- ☐ Disposing of feed
- ☐ Exercising
- ☐ Self-harm, suicidality
- ☐ Family to stress/anxiety
- ☐ Safeguarding concerns

Mobilise psychiatric team to advise on management

Note:
m%BMI = mean percentage BMI

Please do not use BMI as a single indicator of risk

Starvation Syndrome

Minnesota Study

The study had three phases:

3-month control: participants ate normally

6-month semi-starvation period: caloric intake of participant was reduced by 50%

3-month recovery: participants were re-nourished

During the semi-starvation period, men lost on average 25% of their baseline body weight. Unexpectedly, semistarvation also had a dramatic impact on the physiological, psychological, cognitive, and social functioning of the men.

Physical Changes

- Heart muscle mass reduced by 25%
- Heart rate and blood pressure decreased
- Basal metabolic rate slowed down
- Feeling cold all the time
- Fluid retention (oedema)
- Dizziness and blackouts
- Loss of strength, high fatigue
- Hair loss, dry skin
- Decreased hormone levels
- Lack of sexual desire and other changes

Emotional, cognitive and social changes

- Low mood
- Anxiety
- Irritability
- Loss of interest in life
- Impaired concentration, judgement and decision making
- Impaired comprehension
- Increased rigidity and obsessional thinking
- Reduced alertness
- Withdrawal and isolation
- Loss of sense of humour
- Feelings of social inadequacy
- Neglect of personal hygiene
- Strained relationships

Attitudes and Behaviour Relating to Eating

- Thinking about food all the time
- Meticulous planning of meals
- Eating very fast or very slowly
- Increased hunger, binge-eating
- Tendency to hoard (e.g. collecting recipes)
- Increased use of condiments (e.g., spices) for flavour
- Symptoms of starvation syndrome are observed in any individual who has prolonged restricted access to food, no matter what the reason (e.g., prisoners of war).

Reversing Symptoms of Starvation

Participants in the Minnesota Experiment were re-nourished during a 3-month recovery phase.

By normalising their eating through regular rations, the men recovered from many of the physiological and psychological effects of starvation.

Rate of recovery varied among the men, with some taking longer than others to normalise their eating.

Many also reported persistence of symptoms well into the re-nourishment phase (e.g., feeling ‘out of control’, experiencing low mood, inability to identify hunger/fullness cues, episodes of binge eating)

Importantly, these symptoms subsided over time with consistent, adequate nutrition.

What was learned

Physical re-nourishment and weight restoration is essential to reverse these symptoms

The physiological and psychological effects of semistarvation observed in the Minnesota Experiment mirror the experience of many individuals with eating disorders.

Many eating disorder symptoms are a direct result of semi-starvation.

A person does not have to be underweight to experience symptoms of starvation.

Starvation syndrome may be observed if a person's nutritional intake is poor, irregular, or, or if they engage in compensatory behaviours that reduce energy absorption, irrespective of their weight – might have an eating disorder or they might not.

What we know

- Study of individuals with eating disorders is that, in addition to experiencing symptoms of starvation, individuals with eating disorders have significant fears about their shape, weight, appearance and eating.

- When a person who is starving has the opportunity to eat, they will eat. A person with an eating disorder will continue to restrict what they are eating due to their fears. It is therefore crucial that eating disorder recovery focuses on physical renourishment as well as psychological treatment to address anxiety and fear about eating.

Neuroscience of malnutrition

- Brain activity can be affected by even modest dieting, and a young person's developing brain is particularly vulnerable. When a person is malnourished, their brain is not adequately fuelled, and this may mean they struggle to make decisions, solve problems and regulate their emotions

- The brain shrinks, and the fluid spaces in the brain enlarge. This may be the cause of the cognitive impairment (slowed thinking, poor memory and concentration, loss of reasoning skills) which is seen. The atrophy reverses with refeeding.

- We don't think eating disorders are caused by a chemical imbalance in the brain but restricted eating, malnourishment, and excessive weight loss can result in problematic changes to our brain chemistry. Less serotonin

Indicators of Potential and Eating Disorder

- Losing a lot of weight even if not underweight (some patients have started in the obese range)
- ‘healthy living’ that appears to have become extreme (diet, exercise)
- Abnormal bloods or physical examination, changes in sexual function
- Secretive about food intake

Spotting Eating Disorders

- Parents/partner may tell you
- Core difficulty: Anorexia nervosa is *egosyntonic* – patient may not believe he/she is ill, therefore no rationale for treatment, nothing to 'get better' from
- Patients do present more often than controls, with
  - Gynae problems incl amenorrhoea, loss of libido
  - GI problems 'IBS', constipation, gastric reflux
  - Psychological problems
  - Chronic fatigue
  - Exacerbation of physical illness eg Diabetes

Referrals

- Details of current weight/height/BMI and recent weight history
- Urgency
- Details of current eating pattern
- Details re compensatory behaviours – self-induced vomiting - laxative use,, weight loss tablets, diuretics, purging, excessive exercise – ability to sit/rest
- Blood results (FBC, U&E, LFT, Bone profile, Mg)
- Current Medication

- Consider getting patient to complete EDE-Q (freely available) https://www.corc.uk.net/media/1273/ede-q_quesionnaire.pdf

WCEDS

- MDT – psychiatrist, dietician, nurses, support workers, psychologists, occupational therapists, family therapist, administrators.
- Duty worker/medical cover 9-5, Mon-Fri
- Non-emergency service
- “All-age” model, however, CAMHS separate service
- Wiltshire and Swindon
- Liaison with GWH/SDH/RUH
- Comprehensive assessment for eating disorder – consider comorbidities and advise re referrals for other conditions – risk
- FREED Pathway - early intervention

What we offer

- Advice
- Assessment
- SSCM
- Psychological interventions
  - Contemplation
  - Formulation
  - CBT-E / CBT-T
  - Guided Self-Help
  - MANTRA
- Dietetic advice and meal planning
- Occupational therapy
- Family therapy
- Psychiatric review
- Carer support
- Access to Inpatient care or Day patient care

***(we do not offer treatment of comorbid conditions)*

MEED guidelines

Guidance on how to respond to **M**edical **E**mergencies in **E**ating **D**isorders.

- https://www.rcpsych.ac.uk/docs/default-source/improving-care/better-mh-policy/college-reports/college-report-cr233---annexe-1.pdf?sfvrsn=1ba7e785_18

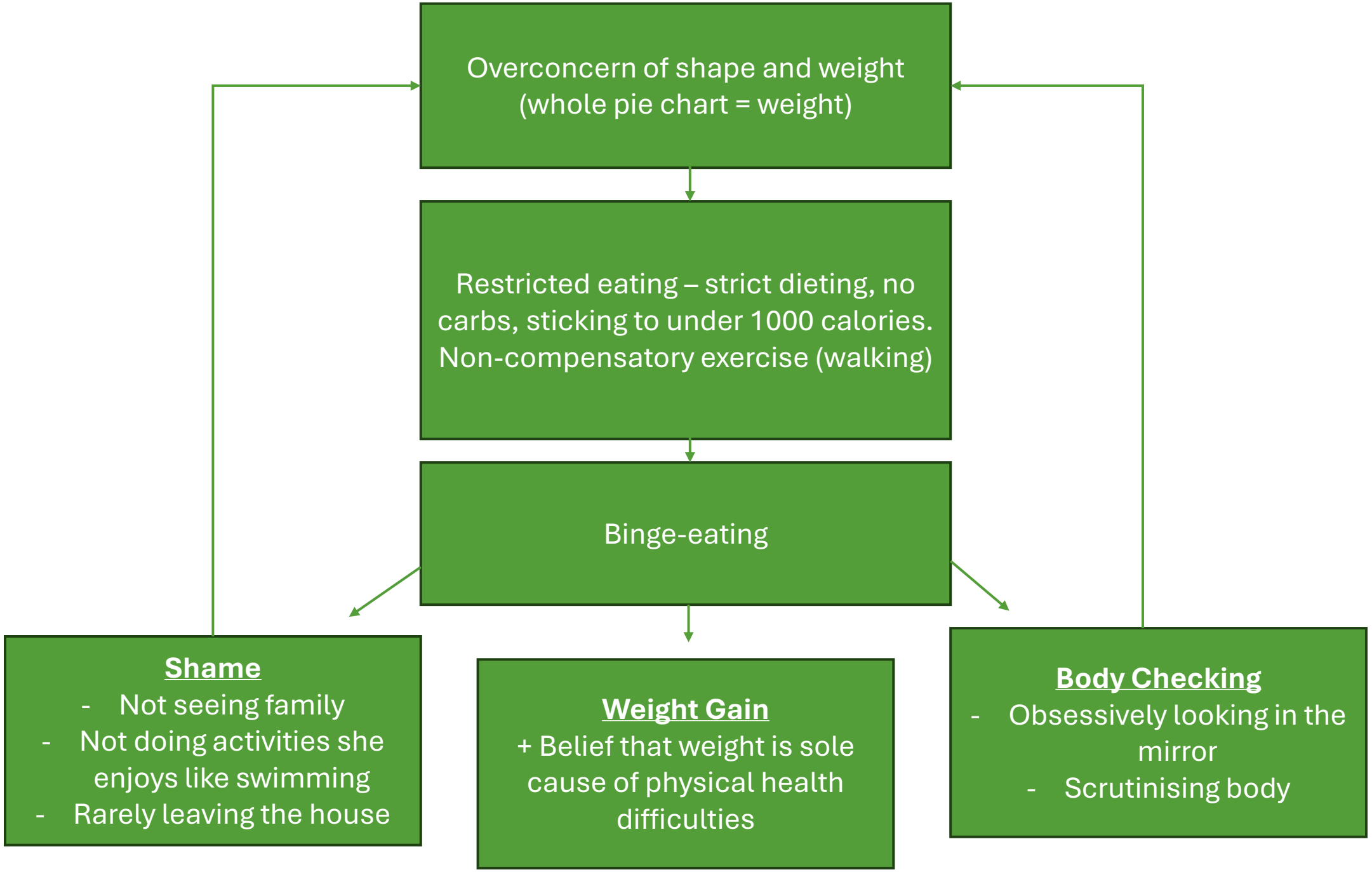
- https://meed.org.uk/

Supportive information

- wceds@oxfordhealth.nhs.uk **Tel 01865 904099**
- https://www.oxfordhealth.nhs.uk/wceds/
- https://feast-ed.org/
- https://www.beateatingdisorders.org.uk/get-information-and-support/about-eating-disorders/types/anorexia/
- https://www.cci.health.wa.gov.au/resources/looking-after-yourself/disordered-eating

BED patient formulation

29-year-old female
Long-term health conditions throughout life = increased focus on weight from health professionals
Attending slimming world despite healthy weight (BMI: 23)
Low mood
Began binge eating during lockdown when mood very low
Weight increased (BMI: 48) – even more focus on weight from health professionals = increased shame
Increased desire to lose weight → higher levels of restriction → increased binge eating


Overconcern of shape and weight (whole pie chart = weight)
Restricted eating – strict dieting, no carbs, sticking to under 1000 calories. Non-compensatory exercise (walking)
Binge-eating
Shame
- Not seeing family
- Not doing activities she enjoys like swimming
- Rarely leaving the house
Weight Gain
+ Belief that weight is sole cause of physical health difficulties
Body Checking
- Obsessively looking in the mirror
- Scrutinising body

Question and Answer

Case studies

Experiences

References

- Hambleton, A., Pepin, G., Le, A. et al. Psychiatric and medical comorbidities of eating disorders: findings from a rapid review of the literature. J Eat Disord 10, 132 (2022). https://doi.org/10.1186/s40337-022-00654-2

- https://nedc.com.au/eating-disorder-resources/find-resources/show/issue-59-i-the-starved-brain-can-what-we-eat-determine-how-we-think

- Sternheim LC, van Passel B, Dingemans A, Cath D, Danner UN. Cognitive and Experienced Flexibility in Patients With Anorexia Nervosa and Obsessive Compulsive Disorder. Front Psychiatry. 2022 May 9;13:868921. doi: 10.3389/fpsyt.2022.868921. PMID: 35615449; PMCID: PMC9124825.

- https://www.nice.org.uk/guidance/ng69/chapter/Recommendations