Results: 103 patients (55 men, 49 women) were referred to the dpc, including three patients not previously known to have diabetes. Those referred had a median age of 57 years (range 26 – 87), one had Type 1 diabetes and the remainder had Type 2 diabetes. Most were awaiting orthopaedic (45%) or urological (18%) surgery. The median HbA1c at referral was 80mmol/mol (range 51-146). Nine patients were lost to follow up and one patient died of unrelated causes. The 93 patients who continued attending the clinic demonstrated a significant reduction in HbA1c from median (range) 79 (51-146)mmol/mol to 63 (43 – 98)mmol/mol; p < 0.01.

Conclusion: A nurse-led pre-surgery diabetes clinic significantly improves preoperative glycaemic control.

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Diabetes specialist nursing: a workforce in crisis
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Introduction: In 2016, Diabetes UK carried out a workforce survey to explore the current state of diabetes specialist nursing, to identify areas for support and assist workforce planning.

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Dietary vitamin D intake and supplement use in people at high risk of, or newly diagnosed with, Type 2 diabetes in 2014-2015 in the South West of England
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Background: Routine use of dietary supplements by people with Type 2 diabetes is not advised. However, in July 2016, the Scientific Advisory Committee on Nutrition (SACN) recommended that all adults should obtain 10mcg of vitamin D/day from dietary sources, including supplements.

Aims: To describe intakes of vitamin D, from food and supplements, in people with, or at high risk of Type 2 diabetes in the South West of England.

Methods: Adults (n = 162, 51% women, 91% white British, mean age 55.9 ± 8.6 years) with Type 2 diabetes (78%), or at high risk, were recruited for a cross-sectional study. Participants completed a four-day food diary, including supplement use.

Results: Median reported vitamin D intake from food was 3mcg/day (IQR = 2–4), mainly from oily fish and eggs. Only five (3%) participants reported ≥10mcg/day from food. Forty-one participants (25%) reported taking dietary supplements, with 29 (18%) taking vitamin D in some form (15 took multivitamins, 8 took cod liver oil and 10 took vitamin D preparations). Supplements contained between 2.5mcg to 25mcg vitamin D and the median taken was 5mcg/day (IQR = 5–12.5). From food and supplements together, median vitamin D intake was 9mcg/day (IQR = 7–13).

Conclusion: People with Type 2 diabetes should be advised to review their diets for good sources of vitamin D and to consider vitamin D supplements, especially in the winter. In order that people meet recommendations there is need for clearer guidance on the amount to take, and an awareness of how much vitamin D that over-the-counter preparations contain.

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The hepatic and metabolic impact of a three week hypocaloric diet in overweight patients: a pilot study
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Aim: Hypocaloric diets are prescribed for pre-bariatric surgery practice for improved metabolism and greater liver compliance around laparoscopic procedures. We assessed the efficacy of a 3-week hypocaloric diet on metabolism and hepatic function in overweight individuals.

Methods: With ethical approval and informed consent eighteen participants (age 41 ± 9 years, BMI 29.3 ± 3.3kg/m², 11 female) were randomised to (i) hypocaloric diet (1,212 ± 393kcal.day⁻¹) or (ii) normal diet (1,800 ± 335kcal.day⁻¹) for 3-weeks. Anthropometry (BMI, fat- and fat free mass) and resting fasted blood samples were taken for determination of plasma glucose,
Obesogenic hospitals: the nutritional value of food and beverage options in hospital vending machines
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Objectives: To evaluate the nutritional value of food and drink options available in vending machines in a hospital setting, looking specifically at products high in fat, sugar and salt (HFSS) in comparison to the availability of water and healthy options.

Methods: Data was sourced by the hospital vendor for products sold in fifteen vending machines from January to May 2016. Each item was assessed for nutritional content based on information found on company websites. NHS Choices was used to calculate percentage of recommended daily intake.

Results: Over five months, 31,143 items were sold to patients, staff and visitors. A total of 4,941,157kcals were sold, requiring an estimated percentage fat (50%) carbohydrate, 20% fat, 30% protein) whilst control maintained typical daily diet. Food diaries were utilised. Following 3-weeks participants were retasted. Data were checked using SPSS for normality and violations treated with Kruskal-Wallis, p ≤ 0.05.

Conclusions: A short-term hypocaloric diet utilised in bariatric practice resulted in reductions in both fat-free and fat-mass and improved some liver enzymes indicative of less hepatic stress.

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Response to GLP-1 receptor agonist treatment pre-bariatric surgery does not predict post-surgery weight loss in patients with Type 2 diabetes: a retrospective study
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Aims: Glucagon-like peptide 1 (GLP-1) is implicated in the weight loss achieved by bariatric surgery (BS). We hypothesised that the weight loss response to GLP-1 receptor agonist (GLP-1 RA) before surgery predicts the post-BS weight loss.

Methods: A retrospective study of patients with Type 2 diabetes who received GLP-1 RA before undergoing BS at a single centre in the UK. Data was collected from the BS database and the patients’ health records. Only patients with 12 months’ postoperative follow-up were included. All patients attended the tier three weight management services before surgery.

Results: Forty-five patients (60% women, age 50.7 ± 11.4 years) were included; 26 had laparoscopic adjustable gastric banding (LAGB), and 19 had either laparoscopic sleeve gastrectomy or gastric bypass (LSG/RYGB). The pre-operative median body mass index was 48.3kg/m² (IQR = 44.5–54) and 44kg/m² (42.9–48.2) in the LAGB and LSG/RYGB groups respectively. The median weight loss at 12 months post-BS was 7.9% (2.9–9.9%) vs 24.8% (19.5–25.9%) for LAGB and LSG/RYGB respectively. GLP-1 RA treatment resulted in 5.7% (1.3–7.8%) and 4.8% (2.1–7.8%) weight loss in the LAGB and LSG/RYGB groups respectively. There was no correlation between the weight loss following GLP-1 RA treatment and the weight loss 12 months post-LSG/RYGB (r = 0.024, p = 0.909) and post-LSG/RYGB (r = -0.313, p = 0.193).

Conclusions: In patients with Type 2 diabetes, weight change induced by pre-operative GLP-1 RA treatment did not predict post-BS weight loss. Lack of weight loss following GLP-1 RA treatment should not be considered as a reason for not referring patients to BS.

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