

## **NUTRICIOLOGY**

**for 4 course students 22 Public health 226 «Pharmacy, industrial pharmacy»,  
educational program «Pharmacy for foreign students»  
ФМ17\*(5,0д) англ 1, 2 groups**

**6.05 - groups 1, groups 2**

**PRACTICAL CLASS. Topic: « Diabetes mellitus. Diet and Dietary supplements»**

### **OBJECTIVE.**

Know the definition of the term “Diabetes mellitus”, classification, symptoms, strategy of treatment, diet, life style, dietary supplements sugarsubstitutes.

### **RELEVANSE**

**Dietary Supplements** - vitamin, mineral or vitamin and herbal supplements alone and / or combined in the form of tablets, powders for oral administration together with food or added to food within physiological norms for further comparison with the conventional power consumption of these substances. Dietary supplements also include or contain different substances or mixtures of substances, including proteins, carbohydrates, amino acids, edible oils and extracts of plant and animal materials, which are deemed necessary or useful for nutrition and general health.

### **CONTROL QUESTIONS**

1. Factors contributing to the development of diabetes.
2. Indicate the main symptoms of developing diabetes mellitus.
3. Diabetic syndrome.
4. Describe the types of diabetes.
5. Key indicators that determine diabetes mellitus.
6. What diet is recommended in diabetes mellitus? Provide the chemical composition and energy value of the daily ration for this diet.
7. What is a glycemic index of food products.
8. Describe the concept of simple and complex carbohydrates.

9. Provide foods with high, medium and low glycemic index.
10. What is a bread unit? How do you use this concept when dieting patients with diabetes mellitus.
11. Describe the diet of patients with diabetes mellitus.
12. DS with diabetes mellitus. Sugar-substituters and sweeteners.

### Tests

1. Indicate the norm concentration of blood glucose for a healthy person on empty stomach:

- A) 1.25-12 mmol / L
- B) 7-10 mmol / l;
- C) 3.33-5.55 mmol / l;
- D). 5.55-8.88 mmol / L;
- E) 11-12 mmol / l;

2. Indicate which foods are not recommended for diabetes:

- A) buns
- B) lean fish
- C) cucumbers
- D) ice cream
- E) oranges

3. Choose food with high glycemic index

A. buns	J. grapefruit,	S. Beer,
B. lean fish	K. banana,	T. dates,
C. cucumbers	L. popcorn,	U. honey,
D. ice cream	M. brown bread,	V. white bread,
E. oranges	N. brown rice,	W. rice,
F. Cucumber,	O. pineapple,	X. mashed potato,

G. cabbage, H. tomato, I. pear	P. raisin, Q. apple juice, R. jam	Y. baked potato, Z. French bread,
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**4. Choose food with moderate glycemic index**

A. buns B. lean fish C. cucumbers D. ice cream E. oranges F. Cucumber, G. cabbage, H. tomato, I. pear	J. grapefruit, K. banana, L. popcorn, M. brown bread, N. brown rice, O. pineapple, P. raisin, Q. apple juice, R. jam	S. Beer, T. dates, U. honey, V. white bread, W. rice, X. mashed potato, Y. baked potato, Z. French bread,
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**5. Choose food with low glycemic index**

A. buns B. lean fish C. cucumbers D. ice cream E. oranges F. Cucumber, G. cabbage, H. tomato, I. pear	J. grapefruit, K. banana, L. popcorn, M. brown bread, N. brown rice, O. pineapple, P. raisin, Q. apple juice, R. jam	S. Beer, T. dates, U. honey, V. white bread, W. rice, X. mashed potato, Y. baked potato, Z. French bread,
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**6. Which compounds belong to sugarsubstitutes?**

Fructose, galactose, maltose, Sorbitol, pectin, cellulose, xylitol, Saccharin, stevioside, aspartame, starch, mucilage, glucomannane

**7. Which carbohydrates belong to digestible?**

Fructose, galactose, maltose, Sorbitol, pectin, cellulose, xylitol, Saccharin, saccharose, glucose, stevioside, aspartame, starch, mucilage, glucomannane

**8. Which carbohydrates belong to nondigestible?**

Fructose, galactose, maltose, Sorbitol, pectin, cellulose, xylitol, Saccharin, saccharose, glucose, stevioside, aspartame, starch, mucilage, glucomannane

**9. Which carbohydrates belong to food fiber?**

Fructose, galactose, maltose, Sorbitol, pectin, cellulose, xylitol, Saccharin, saccharose, glucose, stevioside, aspartame, starch, mucilage, glucomannane, inulin

**10. Choose norm of glycosilated hemoglobin:**

A) less than 12 %

B) less than 22 %

C) less than 10 %

D) less than 7 %

E) less than 20%

**11. Indicate the concentration of blood glucose for a person with hypoglycemia:**

A) 12 mmol / L

B) 7-10 mmol / l;

C) 3.33 mmol / l;

D). 5.55-8.88 mmol / L;

E) 20 mmol / l

## **PRACTICAL TASKS.**

You have to fill in your laboratory hand-book on the topic: *Nutritional correction for Diabetes mellitus. Diet and Dietary supplements.*