## FROM THE HISTORY OF COMPUTERS

Y. A. Susidenko– Sumy State University, group IN-02 S. H. Zolotova – EL Adviser

Computer is an electronic device that can receive a set of instructions called program and then carry out them. The modern world of high technology could not be possible without computers. Different types and sizes of computers find uses throughout our society. They are used for the storage and handling of data, secret governmental files, information about banking transactions and so on.

Computers have opened up a new era in manufacturing and they have enhanced modern communication systems. They are essential tools in almost every field of research, from constructing models of the universe to producing tomorrow's weather reports. Using of different databases and computer networks make available a great variety of information sources.

There are two main types of computers, analog and digital, although the term computer is often used to mean only the digital type, because this type of computer is widely used today. That is why I am going to tell you about digital computers.

Everything that a digital computer does is based on one operation: the ability to determine: on or off, high voltage or low voltage or – in the case of numbers – 0 or 1 or do-called binary code. The speed at which the computer performs this simple act is called computer speed. Computer speeds are measured in Hertz or cycles per second. A computer with a «clock speed» of 2000 MHz is a fairly representative microcomputer today. It is capable of executing 2000 million discrete operations per second. Nowadays microcomputers can perform from 800 to over 3000 million operations per second and supercomputers used in research and defense applications attain speeds of many billions of cycles per second.

Digital computer speed and calculating power are further enhanced by the amount of data handled during each cycle. Except two main types of computers, analog and digital there are eight generations of digital computers or processing units. The first generation was represented by processing unit Intel 8086.

The second generation central processing unit was represented by processing unit Intel 80286, used in IBM PC AT 286. The third generation is Intel 80386, used in IBM PC AT 386. The microprocessors of the fourth generation were used in computers IBM PC AT 486. There are also central processing units of the fifth generation, used in Intel Pentium 60 and Intel Pentium 66, central processing units of the sixth generation, used in computers Intel Pentium 75, 90,100 and 133. Few years ago appeared central processing units of seventh and eighth generations. They are much more powerful and can perform from 2000 to over 3000 million operations per second.