

Frequency Generation Timeline

5000 BC

The earliest recording of notable frequency was the oscillation of light and dark brought by the coming and going of the sun

1656

Christiaan Huygens created the pendulum clock, marking the first deliberate use of oscillation to measure time

1675

The deadbeat escapement invented by Richard Towneley

1832

First alternator to produce current at a set frequency created by Hippolyte Pixii

1888

Ernst Lecher showed that current through an electric arc could be oscillatory

1890

William Duddell popularizes the arc oscillator

1893

Nikola Tesla presented a lecture on his work on both mechanical and electrical oscillators

1918

Alexander Nicholson (At Bell telephone laboratories) patented the first crystal-controlled oscillator

1921

Walter Cady built first quartz crystal oscillator

1950

Bell Labs developed a process for growing quartz crystals rather than mining them, allowing commercial scale production

1957

Mansfield Young Frink submits an early patent on the voltage controlled oscillator

1965

Bell Labs developed a process for growing quartz crystals rather than mining them, allowing commercial scale production

1973

Researchers at Cutler Hammer Inc develop a binary coded digital frequency synthesis technique requiring only two driving frequencies

1987

Numerically controlled oscillator employing a modulation selector was patented by Earl McCune Jr.

1996

Analog Devices introduces a complete DDS on a single CMOS chip – AD9830

2012

Analog Devices introduces AD9914 – a 3.5GSPS DDS IC in a 12mm square package