**Times**

Develop a method to generate/parse XML datetimestamps from instances of Java.time.Instant. Develop a method to parse and add a XML duration to a XML datetimestamp. Answer: Time.Java

URL: <https://github.com/rgmprabodha/emse_session/blob/master/Time.java>

**base64Binary**

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| --- | --- | --- |
| **Base 64** | **Base 32** | **Base 16** |
| Encode a string using Base64.  Not human readable.  Characters are 6 bit length.  A 65-character subset of US-ASCII is used.  a-z, A-Z, 0-9, the plus sign (+), the forward slash (/) and the equal sign (=).  Notably "+" and "/" are treated as word-breaks by legacy text search/index tools.  65th character, "=",  is used to signify a special processing function. | Encode a string using Base32.  Characters are 5 bit length.  Not need to be human readable, but more human-readable than base64.  33-character subset of US-ASCII is used.  enabling 5 bits to be represented per printable character.  33rd character, "=" is used to signify a special processing function. | Encode a string using Base16  A 16-character subset of US-ASCII is used, enabling 4 bits to be represented per printable character.  Unlike base 32 and base 64, no special padding is necessary since a  full code word is always available. |

Develop a method to read a picture on the disk, and generate the Base64 representation of this picture. Answer : Base64Binary.java

URL: <https://github.com/rgmprabodha/emse_session/blob/master/Base64Binary.java>

**XML Schema 1.1**

Write XML Schema definition for the use case of two weeks ago. Answer family.xsd for family.xml

URL: <https://github.com/rgmprabodha/emse_session/blob/master/family.xml>

URL: <https://github.com/rgmprabodha/emse_session/blob/master/family.xsd>

Find a Maven plugin to generate classes from your XML Schema in the generate-sources lifecycle phase. Answer: XML

URL: <https://github.com/rgmprabodha/emse_session/tree/master/XML>

POJO: Plain Old Java Object is ordinary Java object with out and special restrictions and class path.