The thesis should use scientific and technical terms, designations and definitions established by the relevant standards, if there are no relevant standards generally accepted in the scientific and technical literature scientific and technical terms, designations and definitions should be used.

The electronic version of the thesis should be made in A4 format (210x297 mm) with one and a half spacing and font size 14 Times New Roman.

The thesis pages should have the following margins: left - 25 mm, right - 10 mm, top - 20 mm, bottom - 20 mm. The paragraph indention must be the same throughout the text and equal to five characters.

The thesis should be printed in five copies in A5 format, double-sided printing with soft-cover.

**STRUCTURE OF THE MATERIALS OF THE THESIS**

The candidate for a degree presents the materials of the thesis (hereinafter - thesis) in an electronic form through the internal information system of ITMO University (ISU ITMO) that should consist of structural elements arranged in the following order (first 5 positions are created automatically in ISU):

1. Cover page.

2. Title page in Russian.

3. Information about the thesis in Russian.

4. Title page in English.

5. Information about the thesis in English.

6. Contents.

7. Synopsis in Russian.

8. Synopsis in English.

9. The main body of the thesis:

a. Introduction.

b. Main part.

c. Conclusion

d. List of abbreviations and symbols.\*

e. Glossary.\*

f. List of figures.\*

g. References.

h. Acknowledgements.\*

i. Appendices.\*

10. Texts of publications.

\*not obligatory.

**STRUCTURAL ELEMENTS OF THE THESIS SYNOPSIS**

I. GENERAL DESCRIPTION OF THE THESIS

·        Relevance of research.

·        Aim of work.

·        Scientific tasks.

·        Scientific novelty of the thesis.

·        Theoretical and practical significance of the paper.

·        Provisions for defense.

·        Approbation of the thesis.

·        Reliability of scientific achievements.

·        Implementation of the results of the thesis.

·        Publications on the topic of the thesis.

·        Structure and scope of the thesis.

II.               MAIN CONTENTS OF THE THESIS;

·        In introduction.

·        In Chapter I.

·        In Chapter II.

·        In Chapter ... .

·        In Conclusion.

III.            MAIN RESULTS OF THE THESIS AND CONCLUSIONS

IV.      PUBLICATIONS ON THE TOPIC OF THE QUALIFYING RESEARCH PAPER

**Scientific publications** included in international abstract databases and citation systems.

Scientific publications included in the list of Russian peer-reviewed journals.

Publications in other journals.

First 5 positions of the thesis structure (cover page, title page in Russian, information about the thesis in Russian, title page in English, information about the thesis in English) are generated by means of a completed application automatically.

Contents - a list of the main parts of the thesis with its pagination.

The headings in the contents should exactly repeat the headings in the text. It is not allowed to shorten or paraphrase the headings. The last word of the heading is connected by an ellipsis with the corresponding page number in the right column of the contents.

Chapters "INTRODUCTION" and "CONCLUSION" are not enumerated.

The **synopsis** in English has the same structure as the synopsis in Russian.

The **main text** of the thesis should be divided into chapters using no more than three levels of headings. The headings include Arabic numerals. A chapter should start on a new page.

Tables should be titled, and figures should be accompanied by a caption and numbering (Arabic numerals through numbering throughout the synopsis and throughout the thesis, except for the tables of appendices). Tables of each appendix are designated by a separate numbering in Arabic numerals with the addition of the application designation before the digit. If the document has one table, it should be named as "Table 1" or "Table B.1" if it is given in the Appendix B. The title should be written above the table.

The tables used in the thesis should be placed under the text which refers to the tables, or on the next page, and, if necessary, in the appendix to the thesis.

The headings of columns and table rows should start with a capital letter, and the subheadings of columns should be lowercased if they form a single sentence with a title, or capitalized if they have an independent meaning. Full stops are not placed at the end of headings and subheadings. The headings and subheadings of the columns are indicated in the singular.

Tables on the left, right, and bottom are usually delimited with lines.

It is not allowed to separate the headings and subheadings of the box and the graph with diagonal lines.

The head of the table should be separated by a line from the rest of the table.

The height of the table rows must be at least 8 mm.

 All tables should be referenced in the text of the thesis. When referencing, it is necessary to write the word "Table" with an indication of its number.

It is allowed to place the table along the long side of the document sheet.

If the rows or columns of the table go beyond the format of the page, the table is divided into parts, placing one part under the other or next to it, and in each part of the table its head and sidewall are repeated. When dividing a table into parts, it is allowed to replace its head or sidewall with the number of columns and rows, respectively. In this case, the columns and (or) rows of the first part of the table are numbered with Arabic numerals.

The word "Table" is indicated once on the left above the first part of the table, above the other parts there are the words "Continuation of the table" with the number (designation) of the table. When preparing text documents using software tools, the phrase "Continuation of the table" is allowed not to be specified.

**Figures** can be represented by drawings, photographs, maps, graphs, schemes, charts, diagrams, etc.

The figures used in the thesis are placed under the text which refers to the figures, or on the next page, and, if necessary, in the appendix to the thesis.

It is allowed to use appendices of non-standard size, which, when folded, correspond to the A4 format.

Figures are numbered in Arabic numerals through numbering throughout the synopsis (throughout the thesis).

All figures should be referenced in the text of the thesis. When referencing, it is necessary to write the word "Figure" with an indication of its number.

The number of figures should be sufficient to explain the presented text. Figures can be placed either in the text of the document (possibly closer to the corresponding parts of the text), or at the end of it. Figures should be made in compliance with the requirements of the standards Unified system for design documentation and Construction design and estimate documentation. Figures, expect for figures in the appendices, should be numbered with Arabic numerals sequentially. If there is one figure, then it is designated as "Figure 1".

Figures of each appendix are designated by a separate numbering in Arabic numerals with the addition of the application designation before the digit. For example, Figure A.3.

When referring to figures, it should be written “according to Figure 2”.

Figures, if necessary, can have a name and explanatory data (caption text). The word "Figure" and the name are placed after the explanatory data and arranged as follows: Figure 1 - Details of the device.

**List of abbreviations and symbols**

 The list should be arranged in a column. On the left, abbreviations or symbols are given in alphabetical order or in the order of its first mention in the text, on the right - detailed interpretation. The presence of the list is indicated in the table of contents of the thesis.

**Glossary**

The term is written with a lowercase letter, and the definition with an uppercase letter. The term is separated from the definition by a colon. The presence of the glossary is indicated in the table of contents of the thesis. The glossary is drawn up in compliance with the requirements

**References**

The list of references should include bibliographic notes on the documents used by the author.

The following methods of grouping bibliographic records are allowed: alphabetical, systematic (in the order of the first mention in the text), chronological.

In the alphabetical grouping method, all bibliographic records are arranged alphabetically by the names of the authors or the first words of the titles of the documents. Bibliographic records of the works of authors of the same name are arranged in the alphabet of their initials.

In the systematic grouping method, bibliographic records are arranged in a certain logical sequence in compliance with the accepted classification system.

In the chronological grouping method, bibliographic records are placed in the chronology of the date of publication of documents.

If there is a list of references in languages ​​other than Russian, an additional alphabetical list is formed, which is located after the publications in Russian. Bibliographic records in the list of references are made in compliance with GOST 7.0.100.