Vilniaus dailės akademija
Meno ir dizaino laboratorija

PRINT CENTER

WORK RULES

1. **Thoroughly read these rules and warnings signs located on the equipment.**

2. **Print center working hours:**

    I - IV   8:00 – 17:00

    V   8:00 – 16:00

    Lunch break   12:00 – 13:00

3. **Files for printing are provided in:**

    3.1. PDF, TIFF (without layers or transparency), JPEG extensions.

    3.2. In working file formats of certain software: Adobe Illustrator, Adobe Photoshop (up to CS6), CorelDraw (up to X7).

4. **When preparing for printing:**

    4.1. Documents must be 1:1 scale (i.e. the size they need to be printed in).

    4.2. It is recommended to use RGB color space. CMYK and grayscale are also accepted.

    4.3. The document must not contain invisible, toggled off or unused layers.

    4.4. Raster (image) object resolution should be about 300 dpi and not exceed 600 dpi. For wide-format printing the resolution may be less than 300 if there are no small details (e.g. technical drawings, font sizes smaller than 12 pt).

    4.5. Generated PDF files must have used fonts and images embedded. Images in AI documents must have their images embedded. All used images need to be downsampled (compressed / rasterised) down to 300 dpi resolution when desired size is set.

    4.6. Fonts in EPS, AI and CDR documents must be converted to curves (outlined) and in raster graphics files – rasterised.

    4.7. Important information should not be placed closer than 3 mm from the final document size (trimmed size).

    4.8. Files for booklet printing should be provided in a single document where all pages are in succession starting with the cover and ending with the back; the amount of pages should be divisable by 4. Also add empty pages if they are needed. Do not use bleeds or crop marks.

    4.9. Booklets can also be provided with booklet layout prepared. Spreads are not suitable.

    4.10. Rich black can be achieved using RGB=[0, 0 ,0] or CMYK=[50,45,40,100].

    4.11. Transparency, 3D and other Adobe Illustrator or Corel Draw effects are not guaranteed: they should be flattened or rasterised.

    4.12. Do not archive files if possible.

    4.13. Preparing for countour vinyl cutting:

4.13.1.   Provide a vector file byla (PDF, EPS, AI, CDR, DWG);

4.13.2.   You may provide an image file of sufficient quality and with clear outlines for automatic tracing, however precise result is not guaranteed;

4.13.3.   Cutter software does not recognise lineweight, if you need a thick line – convert to outline.

4.13.4.   If you need print and cut (stickers), provide a PDF, AI or CDR files where the graphic to be printed is with an expanded background (bleed) and the cutting contour is marked with a separate object using a different color.

4.14.   Additional info:

4.14.1.   In Illustrator or Corel Draw set the page size to be the desired to print size. All bleeds are done outside the desired page size. Background must be expanded into the bleeds. When generating a PDF file enter a desired bleed value in the settings. In Photoshop page size is set including the bleeds.

4.14.2. Smallest recommended font size is 7 pt.

4.14.3. A4 and A3 single-page documents should not be larger than 150 mb and large format – 300 mb.

4.14.4. When printing double-sided misalignment is to be expected.

5.   Preparing for 3D printing:

5.1. Three-dimensional drawing are needed for 3D printing. Files are provided in STL format.

5.2. The print job is enqueued when a proper, error-free file is provided.

5.3. Files must not exceed 1 million polygons or 50 mb in size.

5.4. 3D object scale must be 1:1 (i.e. the size they need to be printed in).

5.5. 3D objects must be without holes (watertight), not self-intesecting or intersecting other geometry, must not contain duplex edges and vertices (be non-manifold) and objects may not be inside-out (i.e. normal orientation should be outward).

5.6. Object must have a thickness (0 thickness is not allowed).

5.7. Thinnest recognizable walls are 0,6 mm thick.

5.8. Object can not float in mid-air.

5.9. Some problems and errors may be repairable by the worker with the help of special software, an additional charge is incurred in such cases.

5.10.   Recommendations and additional info:

- If intersecting objects are needed, intersecting geometry must be combined (boolean) into a single solid object.

- An object within an object is treated like an empty space.

- Object orientation when printing has an effect on it's strength and detail in X, Y and Z directions. If strength or detail is desired in a certain part inform the worker in advance.

- Keep in mind that plastic deforms slightly (mostly shrinks) when cooling.

- Professional 3D printer has a tolerance of ~0.13 mm and the non-professional – 0.4~0.5 mm. Keep that in mind when designing joints or moving parts.

6. Primary work safety requirements:

6.1. <u>Using the paper trimmer:</u>

6.1.1. The device is designed for cutting paper of different thicknesses. Do not cut solid materials.

6.1.2. Do not place any foreign objects like staples or grommets near the cut line.

6.1.3. Narrow cuts (10 mm) are possible with the help of the front gauge, the gauge automatically moves away from the blade during the cut and the returns. To prepare for cutting a norrow cut the blade must be raised to its highest position and the front gauge needs to be set and fixed into position.

6.1.4. Do not touch the blade, front gauge and the paper clamp when operating. Any actions lowering the safety of the device are not permitted.

6.1.5. To cut paper place it on the device along the ruler and the front gauge and lower the blade. Keep hands 15 cm away from the cutting line.

6.1.6. The device is equiped with a friction mechanism which prevents the blade from lowering by itself. If it does, the mechanism need to be calibrated.

6.1.7. Place materials into designated areas so they do not fall or interfere with work.

6.2. <u>Using the small trimmer:</u>

6.2.1. The device is deisnged for cutting paper of different thicknesses. Do not cut solid materials.

6.2.2. Do not place any foreign objects like staples or grommets near the cut line.

6.2.3. Do not cut more than 15 sheets (of 80 gsm) paper at once. Cut thick sheets one at a time. The trimmer is not made to cut cardboard or thick craft paper.

6.2.4. Any actions lowering the safety of the device are not permitted.

6.2.5. Do not touch the blade. Lift the trimmer by the handles on the sides.

6.2.6. Do not place hands near the cutting side duting cutting.

6.2.7. Cutting is executed by sliding the blade by its handle left and right while holding the paper down from the front.

6.2.8. Do not press the cutter handle downwards while cutting.

6.2.9. Place materials into designated areas so they do not fall or interfere with work.

6.3. <u>Using the binder:</u>

6.3.1. The device is designed to bind stacks of paper of different thicknesses or plastic film.

6.3.2. Do not place any foreign objects like staples or grommets near the perforation line.

6.3.3. To ensure the longevity of the device do not perforate more than 15 sheets (of 80 gsm) paper at once. Plastic films and thick papers need to be perforated one at a time.

6.3.4. Any actions lowering the safety of the device are not permitted.

6.3.5. Place materials into designated areas so they do not fall or interfere with work.

6.4. <u>Using the creaser-perforator:</u>

6.4.1. The device is designed for post-print media processing.

6.4.2. Do not place any foreign objects like staples or grommets near the crease line.

6.4.3. To crease / perforate set the gauge ruler, position the paper against it and lower the handle. Hand must be at lease 15 cm away from the crease line.

6.4.4. Place materials into designated areas so they do not fall or interfere with work.

6.4.5. The swap of creasing and perforating strips is carried out by the print center employee.

6.5. <u>Using the corner rounder-punch:</u>

6.5.1. The device is designed to round the corners of various thickness papers and plastic films.

6.5.2. To hold cards more easily and steadily use additional gauges.

6.5.3. Do not touch the blades.

6.5.4. Do not cut staples or other metal objects.

6.5.5. Do not cut stacks of sheets thicker than the top of the gauge.

6.5.6. Any actions lowering the safety of the device are not permitted.

6.5.7. Place materials into designated areas so they do not fall or interfere with work.

6.6. <u>Using the modular stapler:</u>

6.6.1. The device is used to staple paper and cardboard sheets together.

6.6.2. Use the stapler while seated.

6.6.3. Do not keep your foot on the pedal since the stapling head will get stuck in the material being stapled. In such instances tap on the pedal to return the head into its original position.

6.6.4. Do not place hands under the stapling head.

6.6.5. Do not change or refill staples when the device is powered on.

6.6.6. Any actions not conforming with the safety requirements are not permitted.

6.6.7. Place materials into designated areas so they do not fall or interfere with work.

6.6.8. Turn off the device when finished.

7. **Any tools issued by the Print center personnel must remain in the Print center. Return them when finished.**

8. **Students and employees, i.e. Academy's community, are personally responsible for the tools provided to them.**

9. **Personal belongings brought into the Print center are a personal responsibility of the owner.**

10. **Academy's community working in the Print center must keep it clean, conserve electricity, conserve and protect the material property of the Academy.**

11. **Academy's community working in the Print center must comply with work safety requirements.**

12. **It is forbidden to bring food and drinks into the Print center.**

13. **It is strictly forbidden to smoke in the Print center.**

14. **Persons under the influence of psychotropic substances or alcohol are not permitted in the Print center.**

15. **You may contact the Print center employees who will always help you should you have any questions**