



**Coimisiún na Scrúduithe Stáit  
State Examinations Commission**

**LEAVING CERTIFICATE EXAMINATION, 2018**

**ENGINEERING – PRACTICAL EXAMINATION  
HIGHER AND ORDINARY LEVELS**

**Directions to candidates**

1. You are required to prepare materials and make components, according to the materials list and drawings shown, prior to the Practical Examination in Late April – May, 2018.
2. Prepared materials and finished components **must be your own individual work** and should be clearly identified and stored safely until examination day.
3. **If you use machinery other than that specified in the equipment list in M74A(ML1) to process any part of the examination material, you will lose marks under the relevant headings in the marking scheme.**

<b>Materials per candidate</b>		
<b>Required</b>	<b>Material</b>	<b>Size</b>
1 piece	Clear Polycarbonate	105 × <b>64</b> × 6
2 pieces	Brass	<b>74</b> × 60 × 3
1 piece	Aluminium	20 × 60 × 4
1 piece	U-Aluminium	<b>74</b> mm long of <b>25</b> × <b>50</b> × <b>25</b> × 3
2 pieces	Aluminium bar	To make parts A
1 piece	Brass bar	To make part B
1 piece	Aluminium	To make part C
2 pieces	Aluminium bar	To make parts D
1 piece	Aluminium bar	To make part E
1 piece	Mild Steel Threaded bar	To make part F
1 piece	Aluminium	To make part G
10 Machine screws, Allen Button Head	Steel	M5 × 8
1 Machine screw, Allen CSK Head	Steel	M4 × 8

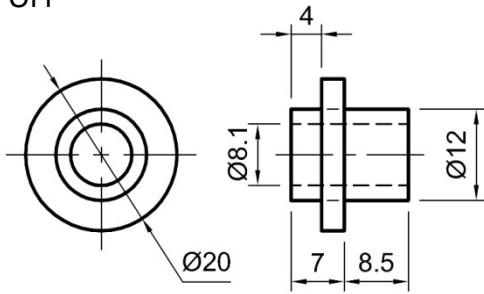
**Note: Bold dimensions are finished sizes.**

**Notes:** The following components are to be made prior to the Practical Examination and **must be your own individual work.**

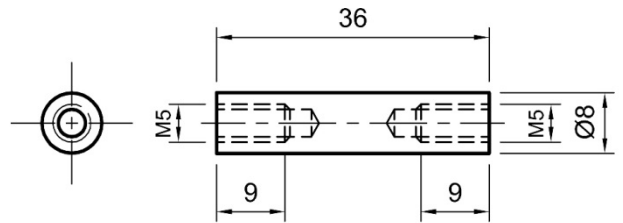
**Your own individual work** is intended to include all the practical activities of making the components in the school under the supervision of the teacher.

**If you use machinery other than that specified in the equipment list in M74A(ML1) to process any part of the examination material, you will lose marks under the relevant headings in the marking scheme.**

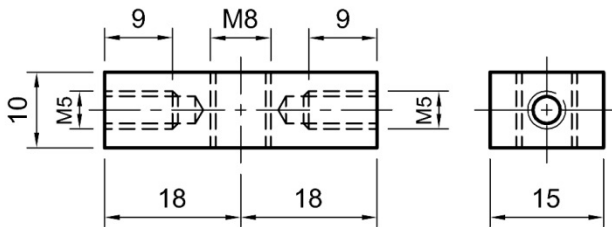
(A) 2 OFF



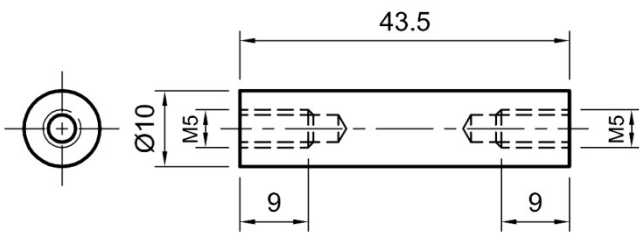
(B)



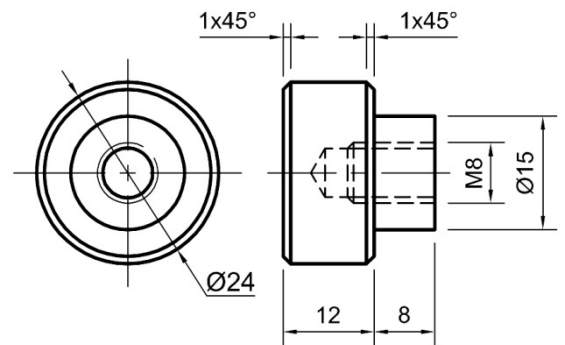
(C)



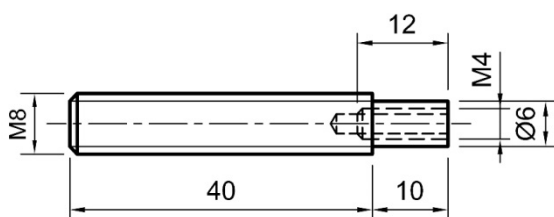
(D) 2 OFF



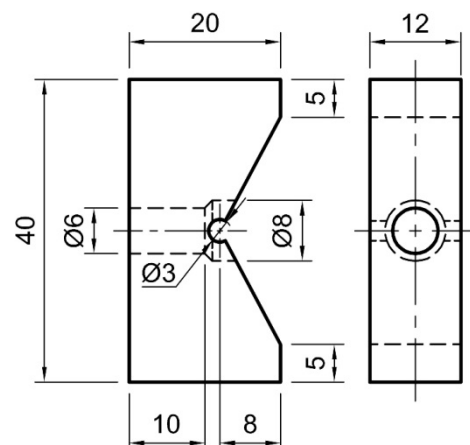
(E)



(F)



(G)



**Note:** Part F should fit neatly and be free to rotate in Part G with the M4 CSK screw securely fitted.



## Coimisiún na Scrúduithe Stáit

## SCRÚDÚ NA hARDTEISTIMÉIREACHTA, 2018

**INNEALTÓIREACHT – TRIAIL PHRAITICIÚIL  
ARDLEIBÉAL AGUS GNÁTHLEIBHÉAL**
**Treoracha ginearálta d'iarrthóirí**

1. Caithfidh tú ábhair a ullmhú agus comhpháirteanna a dhéanamh, de réir liosta na n-ábhar agus na líníochtaí a thaispeántar, roimh an Triail Phraiticiúil i ndeireadh Aibreáin - Bealtaine 2018.
2. **Saothar dílis de do chuid féin** a chaithfidh a bheith sna hábhair ullmhaithe agus sna comhpháirteanna críochnaithe, agus ba cheart iad a shainaithe go soiléir agus iad a choimeád go sábháilte i dtaisce go dtí lá an scrúdaithe.
3. **Má bhaineann tú úsáid as innealra seachas an t-innealra a luaitear sa liosta trealaimh M74A(ML1) chun páirt ar bith den ábhar scrúdaithe a phróiseáil, cailfidh tú marcanna faoi na ceanteidil chuí sa scéim mharcála.**

Ábhair in aghaidh an iarrthóra		
Ag teastáil	Ábhar	Toisí
1 phíosa amháin	Polacarbónáit thrédhearcach	105 × 64 × 6
2 phíosa	Prás	74 × 60 × 3
1 phíosa amháin	Alúmanam	20 × 60 × 4
1 phíosa amháin	U-Alúmanam	Fad 74 mm de 25 × 50 × 25 × 3
2 phíosa	Barra Alúmanaim	Chun páirteanna A a dhéanamh
1 phíosa amháin	Barra Prás	Chun páirt B a dhéanamh
1 phíosa amháin	Alúmanam	Chun páirt C a dhéanamh
2 phíosa	Barra Alúmanaim	Chun páirteanna D a dhéanamh
1 phíosa amháin	Barra Alúmanaim	Chun páirt E a dhéanamh
1 phíosa amháin	Barra Snáithithe de Chruach Bhog	Chun páirt F a dhéanamh
1 phíosa amháin	Alúmanam	Chun páirt G a dhéanamh
10 Scriú meaisín, Ceann Cnaipe Allen	Cruach	M5 × 8
1 Scriú meaisín, Ceann CSK Allen	Cruach	M4 × 8

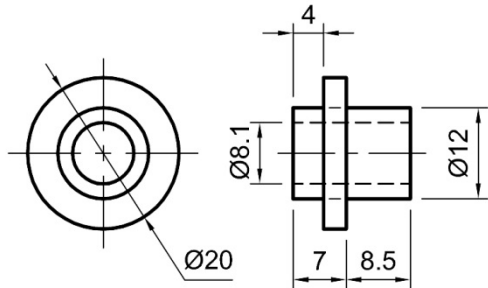
**Nóta: Is toisí críochnaithe iad na toisí i gcló trom.**

**Nótaí:** Caithfeadh na comhpháirteanna seo a leanas a dhéanamh roimh an Triail Phraiticiúil agus saothar dílís de do chuid féin a chaithfidh a bheith iontu.

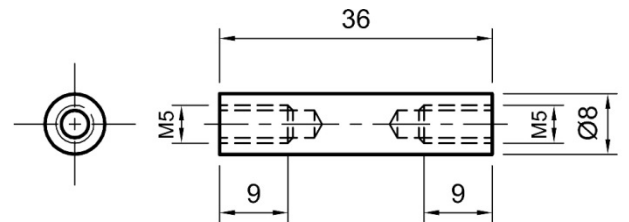
Is é atá i gceist le saothar dílís de do chuid féin ná an saothar praiticiúil go léir a bhaineann leis na comhpháirteanna a dhéanamh sa scoil faoi mhaoirseacht an mhúinteora.

Má bhaineann tú úsáid as innealra seachas an t-innealra a luaitear sa liosta trealaimh M74A(ML1) chun páirt ar bith den ábhar scrúdaithe a phróiseáil, caillfidh tú marcanna faoi na ceanteidil chuí sa scéim mharcála.

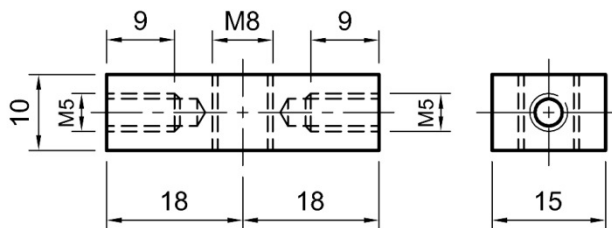
(A) 2 de dhíth



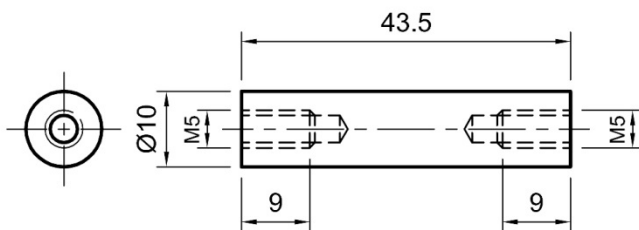
(B)



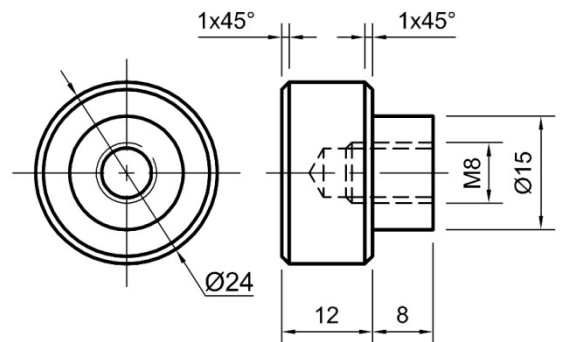
(C)



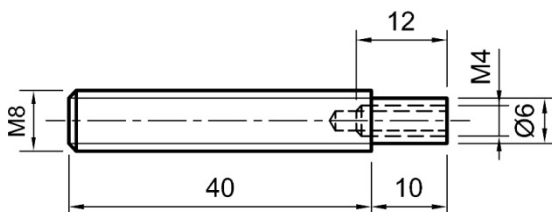
(D) 2 de dhíth



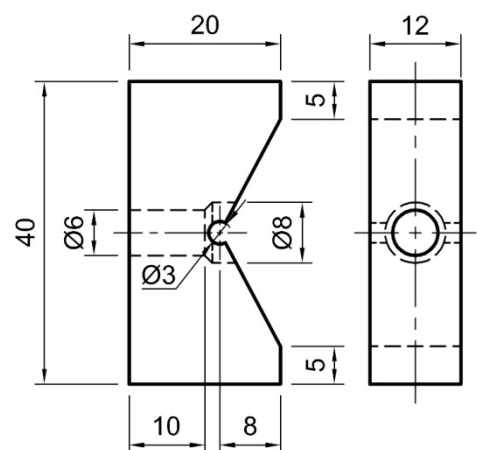
(E)



(F)



(G)



**Nóta:** Caithfidh Páirt F gabháil go néata i bPáirt G agus caithfidh sí rothlú go saorálach nuair a bhíonn an scriú M4 CSK feistithe go daingean inti.