Hafele Grass Novapro Scala User Guide.



Introduction

Overview

- The 'Hafele Grass Novapro Scala Package' from Solid Setup Plus adds the Grass Novapro Scala drawers distributed by Hafele, to Cabinet Vision.
- 186 height drawers have 4 options – 186 sides, 90+Rail, 90 + Crystal or 186 Crystal Plus.
- Tipmatic Soft Close can also be activated at the room level
- Rear Bracket drilling can be set to screws, lugs or both.
- Drawer backs also have a variable height extra Gallery system, controlled by attribute.
- This package provides drilling for the drawer box parts, the cabinet ends and the drawer front for CNC output.
- It also adds 3d graphics for the drawer sides, runners, galleries and brackets etc.
- The Rollout fronts, soft close option and extra Galleries etc. are added as a separate parts and materials for reporting purposes.
- A second Rollout for utilizing wooden fronts instead of metal fronts is provided.
- All material descriptions contain the order number after the # symbol.
- Side Stabilizers are automatically added to wide drawers

Included in This Package

Drawer Guide Schedules:

Npro Scala Sil 40	Silver Drawers with 40kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Sil 40 90+Crystal	Silver Drawers with 40kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Sil 40 90+Rail	Silver Drawers with 40kg guides – 186 height has 90mm profile with Rail.
Npro Scala Sil 40 Crystal Plus	Silver Drawers with 40kg guides – 186 height has Crystal Plus.
Npro Scala Sil 70	Silver Drawers with 70kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Sil 70 90+Crystal	Silver Drawers with 70kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Sil 70 90+Rail	Silver Drawers with 70kg guides – 186 height has 90mm profile with Rail.
Npro Scala Sil 70 Crystal Plus	Silver Drawers with 70kg guides – 186 height has Crystal Plus.
Npro Scala Ice 40	Ice Drawers with 40kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Ice 40 90+Crystal	Ice Drawers with 40kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Ice 40 90+Rail	Ice Drawers with 40kg guides – 186 height has 90mm profile with Rail.
Npro Scala Ice 40 Crystal Plus	Ice Drawers with 40kg guides – 186 height has Crystal Plus.
Npro Scala Ice 70	Ice Drawers with 70kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Ice 70 90+Crystal	Ice Drawers with 70kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Ice 70 90+Rail	Ice Drawers with 70kg guides – 186 height has 90mm profile with Rail.
Npro Scala Ice 70 Crystal Plus	Ice Drawers with 70kg guides – 186 height has Crystal Plus.
Npro Scala Stn 40	Stone Drawers with 40kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Stn 40 90+Crystal	Stone Drawers with 40kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Stn 40 90+Rail	Stone Drawers with 40kg guides – 186 height has 90mm profile with Rail.
Npro Scala Stn 40 Crystal Plus	Stone Drawers with 40kg guides – 186 height has Crystal Plus.
Npro Scala Stn 70	Stone Drawers with 70kg guides – heights are 63-90-122-186-250mm profiles
Npro Scala Stn 70 90+Crystal	Stone Drawers with 70kg guides – 186 height has 90mm profile with Crystal.
Npro Scala Stn 70 90+Rail	Stone Drawers with 70kg guides – 186 height has 90mm profile with Rail.
Npro Scala Stn 70 Crystal Plus	Stone Drawers with 70kg guides – 186 height has Crystal Plus.

User Created Standards

The Following UCS's are provided (ensure they are in this order once installed):

Note The following UCS's must be in the order displayed here.

- { DRAWS } -- Hafele Npro Scala ID's — Revision List (This UCS is Off)
- { DRAWS } -- Hafele Npro Scala Attributes — Adds the Attributes to the drawer backs.
- { DRAWS } -- Hafele Npro Scala Holes — Configures the Drilling values.
- { DRAWS } -- Hafele Npro Scala Brackets — Adds the drawer brackets
- { DRAWS } -- Hafele Npro Scala Galleries — Adds extra Galleries , Crystal Sides etc.
- { DRAWS } -- Hafele Npro Scala Rollout — Adds the rollout metal fronts

Drawer Boxes

The Following drawer box and Rollout constructions are provided:

- Novapro Scala
- Novapro Scala Inner
- Novapro Scala Inner_W (wooden front option)
- We have allowed 1mm extra depth clearance than specified of 4mm
- We have allowed for a default rollout setback of 13mm.

Room Attributes

The Following system attributes are provided:

- "Draw Front Screwon" – True/False

Room Notes

The Following system notes are provided:

- Scala Tipmatic True/False
- Scala Back Holes Screwon / Lugs / Screws and lugs

Novapro Usage

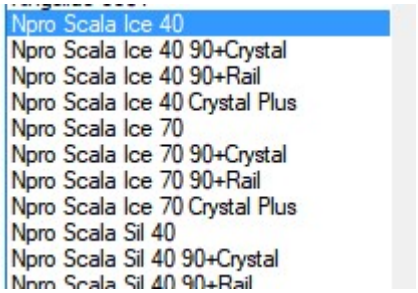
Menu Selections for a Job or Room.

To use the Novapro Scala drawers in a job you must make the following selections:

- In the job or room properties the Construction tab should have the **Drawer Box** set to "**Novapro Scala"** and the **Roll Outs** set to "**Novapro Scala Inner"** as shown here:



- In the Hardware tab, choose one of the Novapro Scala guide schedules:



- In the Materials tab, you can choose any of the Drawer Box or Roll Out schedules you have set up for other drawers as long as the materials selected are suitable for Novapro.

Menu Selections for a Cabinet.

To use Novapro drawers in a cabinet when Novapro has **not** been selected in the room or job the Construction, Materials and Hardware tabs for the cabinet in question **must** be set to the same selections as above.

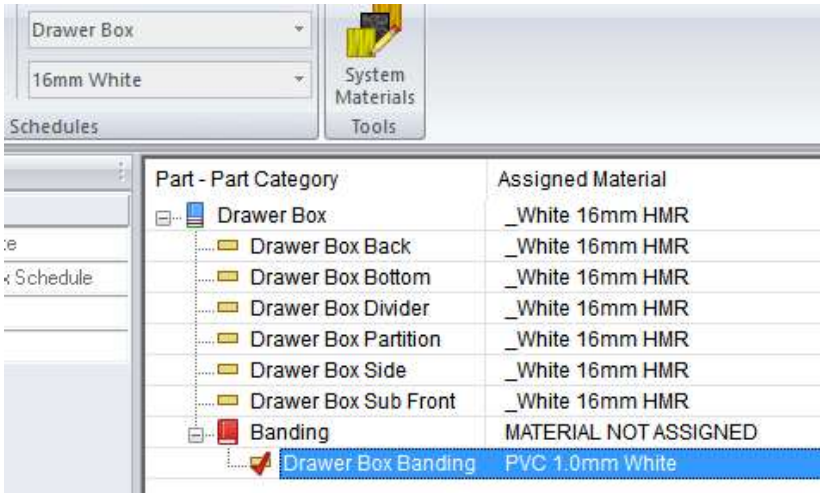
Menu Selections for one Drawer/Rollout.

To use Novapro drawers for one drawer/rollout when Novapro has **not** been selected in the cabinet, or you wish to use a Novapro drawer/rollout from a different drawer guide schedule.

- Take the cabinet into the cabinet editor, click on the section view, and double click on the drawer/rollout to bring up its Properties menu, and then select the Drawer Box or Rollout Tray tab.
- The Construction tab should be set to "**Novapro Scala"** or "**Novapro Scala Inner"** if it is not already.
- To Change to a different guide type press the "**change**" button

Drawer Box Banding Setup

- For the drawer box backs and roll out backs to be banded correctly the selected material schedule for "Drawer Box" and "Roll Out" **must** have a suitable edge banding material selected and the Scala drawer box and rollout construction method must have banding applied to the top of the backs.



- The material schedules can be edited from the splash screen under the "Main" tab

Drawer Box Back Banding 3 sides for Gallery Rails

- Go to the Utilities – Edit User Created Standards from the Plan or Elevation views.
- Then click on the "**{ DRAWS } -- Hafele Npro Scala Attributes"** UCS and press the edit button.
- Change the following line in the UCS:
- BAND<text> = 'CNCC' – for drawer box banding
- Change the 'C' to your banding letter (keeping the single talking marks)
- If you do not know your drawer box banding letter, go into the 'Part Catalog" from the splash screen
- Click on the "Drawer Box" group.
- Look for the Part Called "Drawer Box Banding" and read its Name (eg S_BNDK)
- The last letter of the name is your banding letter!!
- For example if your drawer banding letter is 'K' the line should read:
- BAND<text> = 'KNKK'

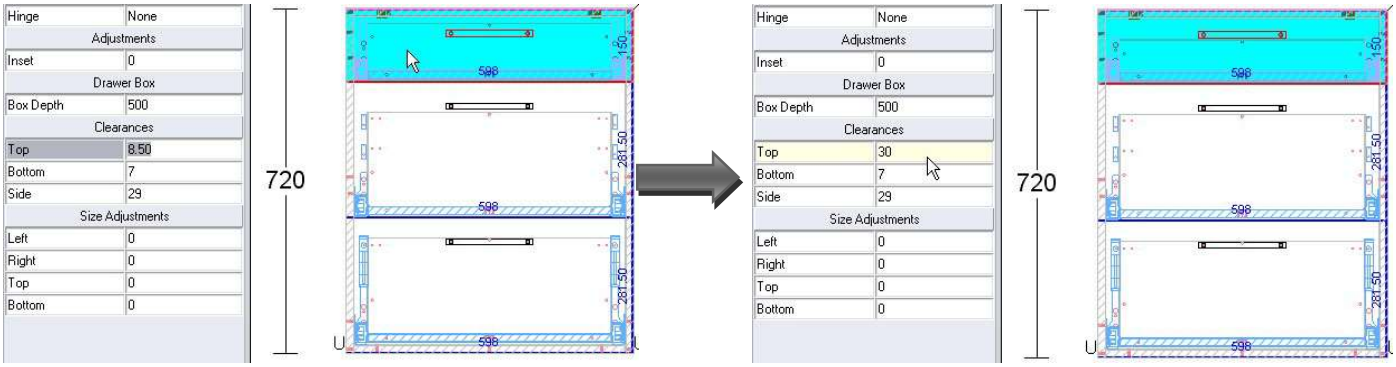
- Lastly, change the following line in the UCS:
- BAND<text> = 'FNFF' – for rollouts, and change the 'F' to your rollout banding letter – which is different.

Drawer Boxes

Drawer Box Height Control

When a drawer is first added to a cabinet, Cabinet Vision will always choose the tallest drawer that will fit from the drawer guide schedule, based on the available space.

- The space is determined by the distance between any cabinet or internal parts directly behind the drawer front, minus the drawer guide material top and bottom clearances.
- To select a smaller drawer height, click on the drawer front in the section view.
- Increase the "Top Clearance" in the sidebar until the drawer height you require appears, like this:



- **NOTE:** ***The top clearance adjustment will only affect gallery heights applied by the ROOM NOTES. Any gallery height you have selected via Back Attribute (explained later on) will ignore the top clearance you have edited.***
- **NOTE:** *If you are using a drawer leveling UCS (which moves the top drawer boxes up to match the bottom lip reference of the bottom drawer), this may cause those drawer boxes to interfere with an object above them, whether it be the next drawer front, the cabinets top or top stretcher or a drawer stretcher or some other part which would normally not be in the way.*
- *This occurs because the leveling UCS is applied* ***after*** *the drawer height selection has been calculated.*
- *To prevent this always check every drawer in the cabinet editor, so you can clearly see any part interference, and reduce the drawer box height using the "Top Clearance" as described above.*

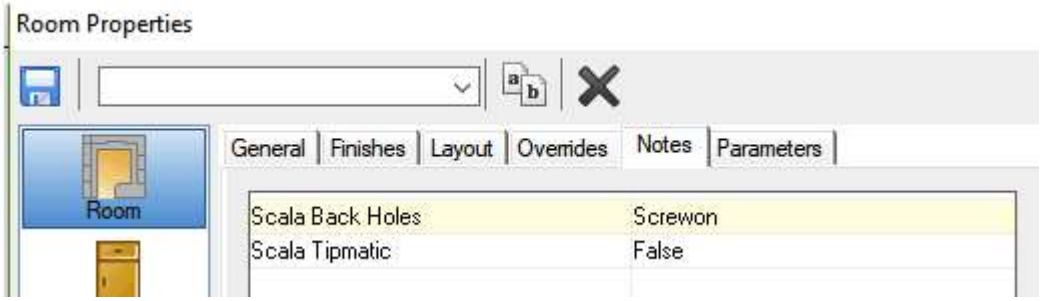
Drawer Box Depth Control

When a drawer is first added to a cabinet, Cabinet Vision will always choose the deepest drawer that will fit from the drawer guide schedule, based on the available space.

- To select a smaller drawer box depth, click on the drawer front in the section view.
- Choose the "Box Depth" from the dropdown list in the sidebar

Drawer Back Drilling

The drawer box back drilling and the Tipmatic Softclose are selected via room notes.
To set the Room defaults go to the Room Notes Tab as shown here:



Set your preferred back drilling option for the room:

- Screwon — Back Brackets are screwed on.
- Lugs — Back Brackets have lugs only
- Screws and Lugs — Back brackets have lugs and also screw holes.

Tipmatic Soft Close

Room Note

If you want to add the Tipmatic Soft Close system for the whole room, change the above room note to “True”

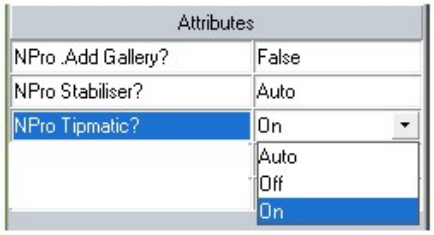
- Scala Tipmatic = True

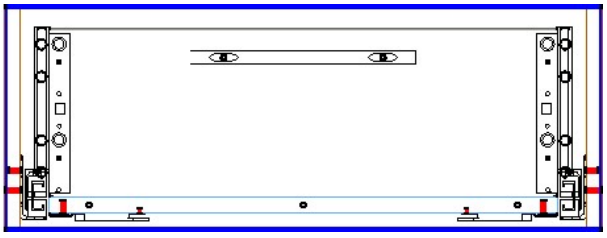
1. This will add the Tipmatic parts under the drawer
2. Adds 2 holes to the drawer bottom
3. Adds the set to the reports
4. Lifts the drawer box up 8.5mm

Per drawer Attribute

The Tipmatic Softclose can be turned on or off per drawer if required.

- Click on the **drawer or rollout back** in an orthographic (smiley face) view of the cabinet editor.
- Select the “**Npro Tipmatic?**” attribute in the left sidebar, (Auto will use the room setting)





Gallery Rails, and Crystal Elements

Gallery Rails or Crystal Sides

The 186 high drawers have 4 options which are selected by choosing the correct drawer guide schedule.

To select 90mm with Gallery rail choose a drawer guide schedule ending with "90+Rail"
To select 90mm with Crystal choose a drawer guide schedule ending with "90+Crystal"
To select 186mm Crystal PLUS choose a drawer guide schedule ending with "Crystal Plus"
All other schedules will select a full 186mm profile instead, or 250mm for larger drawers

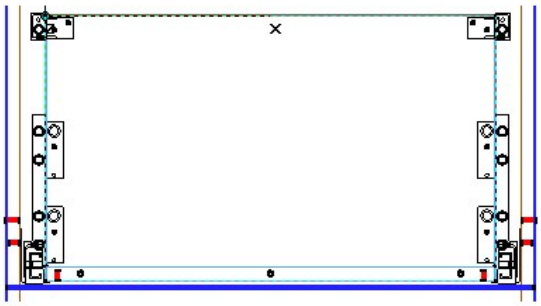
To override one drawer to have a different 186 high selection, you must change the drawer guide on that drawer only. Right click on drawer in section view and choose properties – then in the drawer box tab press "change"s

To select 90mm with Gallery rail choose a Npro Scala drawer guide that has "090Rail" in its name
To select 90mm with Crystal choose a Npro Scala drawer guide that has "090Cstl" in its name
To select 186mm Crystal PLUS choose a Npro Scala drawer guide that has "186Cstl" in its name
To select 186mm full side choose a Npro Scala drawer guide that has "186 x" in its name

Extra Gallery Option

- An Adjustable height gallery rail can be added to **ANY** Scala drawer, as long as there is room above the drawer box.
- Click on the **drawer or rollout back** in an orthographic (smiley face) view of the cabinet editor.
- Press the "**Npro .Add Gallery?**" attribute in the left sidebar:

Attributes	
NPro .Add Gallery?	True
NPro Max Height:	395.36
NPro Stabiliser?	Auto
NPro Tipmatic?	Off
NPro Variable Height	300



- **Npro .Add Gallery?:** **Adds extra gallery if there is enough room.**
- **Npro Max Height:** **Displays the maximum variable back height which can be entered after extra galleries are added. (THIS IS A NOTE ONLY – CHANGING ITS VALUE DOES NOTHING)**
- **Npro Variable Height** **Allows the drawer back size to be increased up to the "Npro Max Height:" displayed. (The Galleries will stay at the top of the back.)**

Side Stabiliser bars

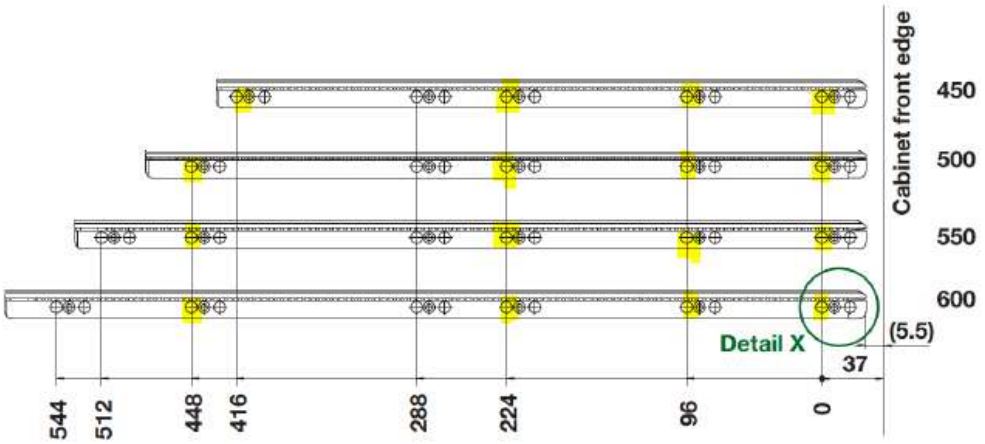
The Hafele Side Stabiliser bars will be **automatically** added to any drawer or rollout **wider than 868mm** Internal Cabinet Width. *This reflects the Hafele recommendation of 900mm Overall Cabinet Width (OCW)*
They are only available for 450, 500, 550 and 600mm deep drawers.
Always check that there is at least 19mm clearance behind the drawer! (There may be as little as 4mm)
The drawer WILL NOT Shrink in depth to allow for these automatically!
To turn the side stabilizer on or off manually follow these steps:

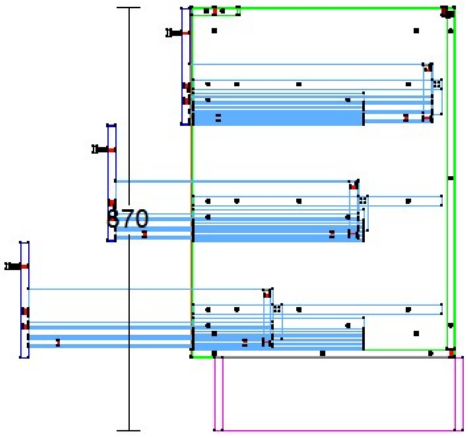
- Click on the **drawer** or **rollout back** in an orthographic (smiley face) view of the cabinet editor.
- Change the "**Npro Stabiliser?**" attribute in the left sidebar to "**True**" to turn on or "**False**" to turn off.

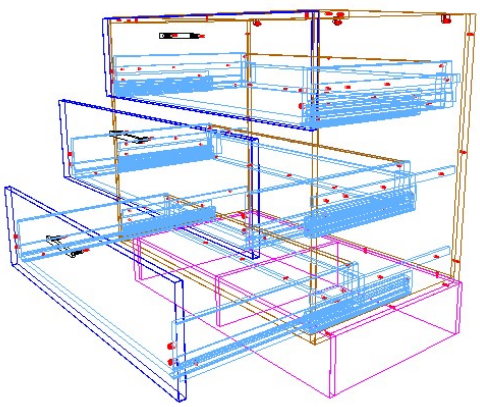
The following parts will be added:

- Kit with correct code for ordering.
- Torsion Bar with correct length for cutting
- Visual slides
- Visual back brackets

Drilling Holes selected for slides:







Rollouts

Rollout Height Control

- To add a rollout in the section interior view of the cabinet editor, add a "Split Horz" and then select it and change it to a "Rollout Tray" in the left sidebar. Or use the "Split Multi Horz" function and choose the "Roll-out Tray" button and then press OK.
- **NOTE:** *The actual heights of the inner drawer are slightly more than the above measurements due to the taller front brackets etc. This may cause the inner drawers to interfere with each other or another cabinet part.*
- *To prevent this always check every rollout in the cabinet editor, so you can clearly see any part interference.*
- *The actual overall heights of the rollouts are as follows:*

1. 96mm for the standard 84 Height rollout
2. 198mm for the 186

Rollout Depth Control

- When a rollout is first added to a cabinet, Cabinet Vision will always choose the deepest rollout that will fit from the drawer guide schedule, based on the available space.
- To select a smaller rollout depth, click on the rollout in the section interior view.
- Increase the negative "Depth" adjustment in the sidebar until the size required is selected

Rollouts with wooden fronts (Novapro Scala Inner_W)

- This Rollout type will not use the Scala metal front piece, but will use a wooden front instead.
- The wooden front size and banding is set in the Roll Out Wizard – Roll Out Front
- Default overhangs are : Bottom 5mm , Sides 25mm , Top -5mm (5mm above sides)
- You can alter the wizard if you prefer different overhangs.
- The material for the wooden front and its edge banding are set in the Rollout Material Schedule

Match wooden front material to drawer front material

- To use the same material for the rollout front, as the drawer fronts, you can either create a new Rollout Material Schedule, or modify it at the room/job level.
- To use the same edge banding as the drawer fronts, follow these steps:
- In the part catalog, click on the Roll Out folder, then the Banding folder, then click New
- Select one of the available banding names, and enter the description "Roll Out Front Banding" – OK
- In the Roll Out Wizard – Roll Out Front, select the "Roll Out Front Banding" on all edges of the front
- In the Roll Out Material Schedule – change the "Roll Out Front Banding" to the same banding as the drawer front banding.
- Change the Roll Out Front material to the same material as the drawer fronts

Drawer Fronts Screwon

Room Attribute

The "Draw Front Screwon" is a Room attribute which will change all the drawer front mounting holes to screw holes and change the front bracket material to the screw mount bracket for reports and ordering purposes.

Drilling Setup

UCS Public Variables

There are several Public Variables in the "**{ DRAWS } -- Hafele Npro Scala Attributes "** UCS.

- To change these variables go to the Utilities – Edit User Created Standards from the Room Plan or Elevation views



- Then click on the **"{ DRAWS } -- Hafele Npro Scala Attributes"** UCS.
- On the top right hand side of the screen you will see the Public Variables list:

Public Variables	
Back over Base?	0
Box Bottom Depth	12mm
Box Bottom DIAM	5mm
Front Knockin Depth	13mm
Front Knockin DIAM	10mm
Front Screwon Depth	5mm
Front Screwon DIAM	3mm
Gallery Front Depth	13mm
Gallery Front DIAM	10mm
Gallery Back Depth	5mm
Gallery Back DIAM	3mm
Guide Cabinet Depth	12mm
Guide Cabinet DIAM	5mm
Box Back Lug Depth	13mm
Box Back Lug DIAM	10mm
Box Back Screw Depth	5mm
Box Back Screw DIAM	3mm
Box Back Stabilizer Depth	5mm
Box Back Stabilizer DIAM	3mm
TMSC Bottom Depth	5mm
TMSC Bottom DIAM	3mm

Back over Base? = **Change to "1" if you change the drawer box constructions to have the drawer back sitting on top of the drawer bottom.** (If you have not modified the drawer constructions supplied – leave this value at zero.)

For the remaining variables, each set of holes has a diameter and depth value:

Box Bottom = Holes in the Drawer box or Rollout bottom for the drawer side profiles.
Front Knockin = Holes in the Drawer Front for drawer side brackets if Room Attribute "Draw Front Screwon" is False.
Front Screwon = Holes in the Drawer Front for drawer side brackets if Room Attribute "Draw Front Screwon" is True.
Gallery Front = Holes in the Drawer Front for the Gallery Rail front brackets.
Gallery Back = Holes in the Drawer box or Rollout back for the Gallery Rail back brackets.
Guide Cabinet = Holes in the Cabinet for the Drawer or Rollout Guides.
Box Back Lug = Holes in the Drawer box or Rollout back for the drawer side profiles Lugs.
Box Back Screw = Holes in the Drawer box or Rollout back for the drawer side profiles Screws.
Box Back Stabilizer = Holes in the Drawer box or Rollout back for the drawer stabilizer bracket.

TMSC = Holes in the Drawer box or Rollout bottom for the Tipmatic Soft Close screws..

Note: To turn off any of the holes if not required, like the box bottom holes for example, set the depth to zero.

Once you have changed these values to your requirements, you can close the UCS editor.

Tools Required

- The drill diameters you choose in the UCS Public Variables above are all required for this package to work. You must have these tool diameters in your tool catalog and in your machine.

Package Exclusions

Any other items shown in any images such as cabinet screw holes, benchtop brackets, plastic legs etc are also part of our other packages which are sold separately.

See our website for more detailed information on these packages.