

Small product, high impact

In last year's summer, the artist Peter Peereboom visited BPO with a splendid idea for a new product: the pocket butt-tray. Because it appealed to us, BPO developed the concept into a plastic product (as you can see on the picture) with aluminium snuffer. The product is reusable, easy to clean and has a very low price, so in due time, replacement is not a problem. It is pre-eminently usable for promotions or special offers. The product contains of two plastic parts and a patented aluminium snuffer.

As well as the development, BPO also organized the manufacturing for this product in China. BPO's employee in China selected the right mould maker and manufacturer for the product. We offer this service next to our current services (development, engineering and optimisation of plastic products) for all our customers. We are happy to arrange for you a tool, test serie or alternative production location.

Opposed to other alternatives, BPO approaches the Chinese market via our man in Shanghai. By knowing the large number of possible suppliers, we can select the right supplier for your project. Every project and product gets the attention it deserves. At the start of the project we assess whether going to China is the right way for your product. For our butt-tray (a proper name is still being considered), it turned out to be a flexible and a financially sound way.

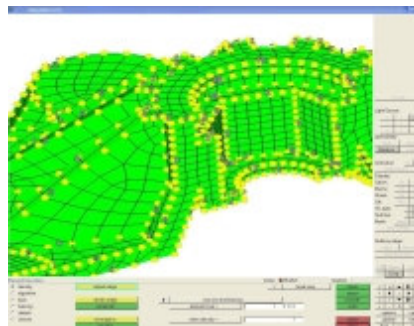


At present, the butt-trays are produced in many variations including a "glow in the dark" (that, very Chinese like, does not glow in the dark), a BPO orange version and one with a metallic look.



Software investments

Last year BPO invested in new software: Hypermesh and Optistruct. With these programs we are able to speed up our meshing capabilities (building fem models) and deepen our analyses. We are able to automatic optimise parts for several different load cases and where the geometry will be modified and optimised automatically. A very powerful and interesting option, but only applicable for certain cases. And our engineers stay indispensable.



Besides the investments in FEM-programs for strength and stiffness analyses we also deepened our knowledge for moldflow simulations. Especially our moldcool simulations where cooling channels and different layouts were simulated proofed to be very powerful and worth their invest: cycle times reduction in certain cases with 25 %!

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Links:

For more information, see:
www.bpo.nl

Tips:

BPO attend



Kunststoff-
Verarbeitungsmesse
15 - 18 March 2006
Hal 21 F9.1
Bad Salzuflen(GE)
www.messezentrum.de

and

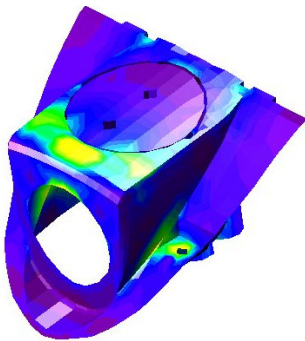
**PLASTICS INNOVATIONS
BENELUX**
Antwerp expo, Antwerpen(BE)
29 - 30 March 2006
Standnr. 200
www.easyfairs.com

Reduced light pollution thanks to Libra luminaire

Industria Technische Verlichting B.V.(NL) has developed a new street light: the Libra.



This new luminaire has several innovations that benefits the user as well as the environment. The light scatter is reduced by 30% to 80% which reduces light spillage and glare, whilst maintaining the going standards in illumination of the road surface. Furthermore, optimal water tightness (IP66) is guaranteed. All this is combined with an elegantly designed housing that fits neatly into its mast arm.



The luminaire consists of either one of two mast pieces that slides or is placed on top of the mast and a lamp housing. The housing is mounted on a mast piece, which allows for flexibility and easy fitting on site. BPO has supported the development of the luminaire by simulating the loads it will encounter. It goes without saying that wind force was one of these loads.

The luminaire is optimised by BPO's engineers to endure short but high peak loads. The end point of the luminaire can support 100 kilograms without causing lasting deformation or breakage. In order to withstand these loads successfully BPO has optimised the housing and the two different mast pieces with the aid of FEM analyses. With relatively small adjustments, the strength and stiffness of the luminaire has improved dramatically, resulting in the luminaire meeting the requirements with ease. At present, the Libra is on sale and the Dutch town of Assen was the first to fit this new generation of street light.

Application form

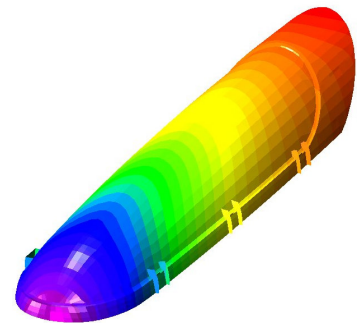
Company _____
Contact _____
Address _____
Code/City _____
Telephone _____ Fax _____
Email _____

- I would like more information, please contact me.
- Update* was addressed incorrectly, please send it to the address above.
- I would like to receive *Update* by e-mail.
- I do not wish to receive another issue of *Update*.



Links:

For more information, see:
www.industria.nl
www.bpo.nl



Tips

Snap-fits are a popular means for connecting plastic parts. The basic principles are simple, but detailing them demands serious attention. Many websites give online calculation forms that help to determine the shape and dimensions to achieve a certain behavior. The following links could help you further:

<http://pepe.cmqnet.com/SnapFit/workspace.jsp>

<http://kingkong.me.berkeley.edu/html/snapplet/>

http://www.engineersedge.com/snap_fit_straight.htm

<http://www.coe.uncc.edu/~jsraquet/java/ItsASnapIntro.html>

<http://www.rpi.edu/dept/mane/deptweb/student/snapfit/index2.htm>

You also can find these links on: www.bpo.nl