

# Ergonomics in practice

## – Service counters –

The design of a service counter is often primarily oriented towards the customer. To be able to present a large range of goods, often preference is given on counters with a large depth. As a result, sales staff must lean far forward while interacting with the clients. As a result, employees in food and beverage sales complain about musculoskeletal disorders (especially in the upper back and shoulder) more frequently compared to other sectors.

### Advice on the ergonomic design of service counters

#### Structure of a service counter

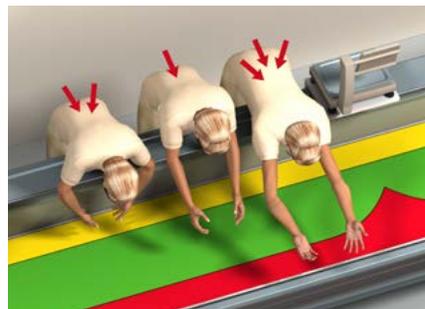
A service counter essentially consists of the following elements: Frame, display, tray, pane, upper shelf and worktop.



#### Counter layout

Goods that are frequently requested and heavy should be placed in the “green” area of the counter, as the body posture is most favourable here.

In the “red” area, light or less frequently requested goods should be placed, as the body posture is most unfavourable here. The “yellow” area is partly under the worktop, so that the goods are difficult to see and encompassing is needed.



#### Display depth

A display depth of 600 mm is ergonomically favourable. For refrigerated counters, the worktop should be as narrow as possible, and the chopping board and scales should be able to slide on it.

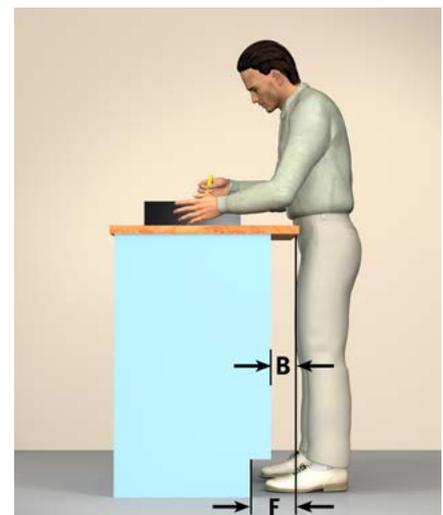


#### Working height

The worksurface height should not exceed 90 cm. When working in a standing position, e. g. cutting, the working height should be about 10 to 15 cm below the elbows.

#### Foot and leg space depth

The depth of the footwell F is made up of the base setback and the overhang of the counter and should be at least 15 cm. The overhang of the worksurface should be at least 8 cm so that the legroom depth B at knee height is sufficient.



#### Struts

On a counter without struts or supports, the goods can be reached without reaching around to the sides.



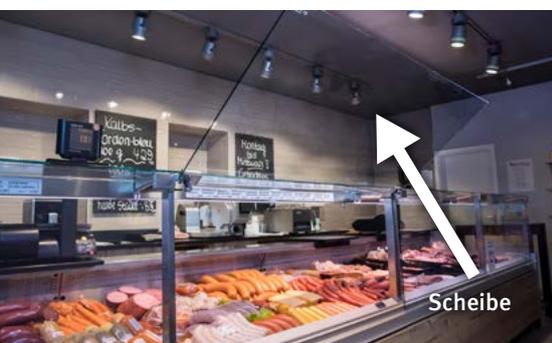
### Cash register

The input screens should be adjustable in every direction so that the user's hands are not folded upwards during input. The cash register pull-out should be short so that it protrudes only slightly into the aisle.



### Counter panes

The counter panes should open upwards for easy cleaning on the customer side and be secured against unintentional closing by using gas pressure springs.



### Counter shelves and inserts

Intermediate shelves allow the presentation of products in multiple layers and are easily removable (figure 1)..

The counter tray can be easily cleaned as the counter shelves can be lifted from the customer's side (figure 2).



Figure 1



Figure 2

### Storage compartments

Refrigerated storage compartments or drawers under the counter display allows easy access to the display products and quick restocking of the counter.



### Counter elements with castors

Counter elements on castors create space quickly when needed, e. g. in front of the oven. In refrigerated counters, extendable elements in the refrigerated space can be loaded from the front and sides without leaning over the worksurface.



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