1 The significance of office work from home

Computer-based work lends itself to being performed from home more than almost any other form of work. Even before the Corona crisis, office work from home, telecommuting and mobile work were highly topical. Discussion focused upon effective organization of the office-based tasks, as well as the compatibility of work and family life, flexibilization of employment, and the reduction of CO₂ emissions achieved by the decrease in commuter traffic.

Under the SARS-CoV-2 Occupational Safety Rule, office work performed from home constitutes a form of mobile work.
2 The legal status of office work from home

During mobile work, a task is performed at a computer screen away from the company premises, such as in a restaurant, on a train or in a hotel. Work from home is a particular form of mobile work which is performed temporarily by employees with their employers’ prior agreement.

In Germany, mobile work is subject to the provisions of the German Occupational Health and Safety Act (ArbSchG) and Working Hours Act (ArbZG). Unlike teleworking, mobile work is not subject to special provisions.

In teleworking (telecommuting), the employee has a permanent computer workstation at their home or own premises. The employer is responsible for setting up this workstation. A workstation for teleworking is subject to the provisions of the German Ordinance on workplaces (ArbStättV), and should ideally be designed and set up in the same way as a computer workstation on the company’s premises.

During the SARS-CoV-2 epidemic, working from home has become even more relevant, as a means of keeping the risk of infection with SARS-CoV-2 as low as possible. When offices in companies would otherwise be shared by several workers, it may be particularly advantageous for some of them to work from home in order to reduce the number of people present in the office simultaneously.

Should employees and/or employers wish to continue the arrangement more than merely sporadically once the SARS-CoV-2 epidemic has passed, the situation must be reassessed.

3 Criteria to be met when office work is performed from home

As a rule, an employer provides employees with the computer equipment required for them to work from home.

A smartphone or tablet PC may be sufficient for the purposes of electronic communication. Writing longer texts, answering e-mails at length or dealing with complex work tasks quickly becomes arduous on such devices, however.

A laptop, i.e. a device with its own keyboard and touchpad, improves the ergonomic situation in the home office considerably. Use of a separate keyboard and mouse improves the ergonomics further still. Ideally, employees should have a separate keyboard, mouse and screen. A good workstation set-up can be created in a home office by means of a suitable desk, an office chair and an ergonomic layout of the work equipment on the desk.

Another important requirement for a computer workstation in the home environment is fast and powerful Internet access. This is available in many regions in Germany and other countries. According to media reports however, the quality of Internet access is still poor in some German districts. A number of Internet service providers point out that such deficits in the networks could be corrected by other technical solutions, such as mobile telephone or satellite links. Where working from home is planned for people living in the regions affected, the employer should assist in setting up appropriate technical solutions. This applies in both normal and crisis situations.

The home office workstation is normally connected to the company’s network by means of a virtual private network (VPN). To ensure data security, virtual private networks are normally encrypted. To enable employees to work securely from their home offices, even during a crisis, an adequate number of users must have access to the company’s network via a VPN. Should a crisis situation emerge, additional licenses should be obtained swiftly. If necessary, alternative technical solutions must be used (such as DirectAccess or cloud solutions) to provide all employees with secure access to the company’s network.
4 Design of an office workstation in the home

This brochure describing the design and setting up of a mobile computer workstation for working from home is based on Fachbereich AKTUELL FBVW-401, Mobile work in hotels.

The basic requirements described in FBVW-401 can also serve as a reference when mobile workstations are to be set up in the private/home environment. The various ergonomic recommendations can be combined as required. For example, an office chair at a MINIMAL table top is without a doubt ergonomically superior to a dining room or visitor chair. In turn, a desk in the OPTIMAL category, even if it is not height-adjustable, is ergonomically superior to a table top of the FUNKTIONAL category.

<table>
<thead>
<tr>
<th>Category</th>
<th>MINIMAL</th>
<th>FUNKTIONAL</th>
<th>OPTIMAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Examples of mobile workstations</td>
<td><img src="image1" alt="MINIMAL Example" /> <img src="image2" alt="FUNKTIONAL Example" /> <img src="image3" alt="OPTIMAL Example" /></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Desktop</td>
<td>Area: 800 x 600 mm</td>
<td>Area: 1200 x 800 mm</td>
<td>Area: 1600 x 800 mm</td>
</tr>
<tr>
<td></td>
<td>Not adjustable for height</td>
<td>Not adjustable for height</td>
<td>Adjustable for height</td>
</tr>
<tr>
<td></td>
<td>Height: 740 ± 20 mm</td>
<td>Height: 740 ± 20 mm</td>
<td></td>
</tr>
<tr>
<td>Legroom width</td>
<td>At least 600 mm</td>
<td>At least 850 mm</td>
<td>At least 850 mm</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Recommended: 1200 mm</td>
</tr>
<tr>
<td>Legroom depth</td>
<td>600 mm</td>
<td>800 mm</td>
<td>800 mm</td>
</tr>
<tr>
<td>Chair</td>
<td>Dining room or visitor chair</td>
<td>Dining room or visitor chair</td>
<td>Office swivel chair with suitable castors</td>
</tr>
<tr>
<td>Free movement area at the mobile</td>
<td>800 x 800 mm</td>
<td>1200 x 800 mm</td>
<td>1600 x 1000 mm</td>
</tr>
<tr>
<td>workstation</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 1: Excerpt from FBVW-401 „Mobile work in hotels“
4.1 Recommended work equipment for particular work tasks

Smartphone or tablet PC: suitable for brief tasks, such as:

- Reading of emails, writing of short responses
- Internet searching
- Use of messenger services (e.g. WhatsApp or Signal)
- Use of applications adapted to the end device (use of adapted input screens)
- Video conferencing possible (limited by display size, simultaneous reading of texts, following of presentations)

Laptop (without additional keyboard, mouse, screen, furniture): suitable for work for an hour at a time, such as after field work or for completing work tasks after leaving the office, involving activities such as the following:

- Comprehensive responses to e-mails
- Preparation of reports following field work
- Completion of work already started, e.g. to meet a deadline

Recommendation that both of the arrangements described above be used: occasional work on a couch or garden chair is quite acceptable, but use of a firm table (such as a dining room table) and a suitable chair (visitor or dining room chair) is recommended.

Laptop with a screen sufficiently large for the activity (a screen diagonal of at least 15” is recommended), supplementary keyboard and mouse, and if possible with a second screen to improve the ergonomic situation further, during activities such as the following:

- Work for longer periods
- Extensive word processing work
- Preparation of reports, presentations
- Participation in video conferences lasting several hours

Furniture satisfying at least the requirements of the MINIMAL category¹ is suitable for sporadic/occasional and in some cases daily work in a home office.

Furniture satisfying at least the requirements of the FUNCTIONAL category¹ is also suitable for work lasting several days. Where only a single screen is used, paperwork is modest and a swivel office chair is available, this level of equipment also constitutes a suitable workstation for teleworking (minimum requirement for a teleworking workstation; a free movement area of at least 1.5 m² must also be assured at the workstation).

Furniture satisfying at least the requirements of the OPTIMAL category¹ is a good level of equipment for a computer workstation, and can thus also be used as a teleworking workstation without restrictions.

---

¹ In accordance with the categories described in Fachbereich AKTUELL FBVW-401, Mobile work in hotels
Figure 1: Possible furnishings of a mobile workstation: FUNCTIONAL category

Free movement area at the mobile workstation

Functional area, e.g. area swept by furniture doors or drawers, avoid overlap with functional areas of other furniture or the sweep range of doors

Figure 2: Possible furnishings (floor plan) of a mobile workstation: FUNCTIONAL category (all dimensions in m)
Figure 3: Possible furnishings of a mobile workstation: **FUNCTIONAL** category suitable as a workstation for teleworking

Free movement area at the mobile workstation

Functional area, e.g., area swept by furniture doors or drawers; avoid overlap with functional areas of other furniture or the sweep range of doors

Figure 4: Possible furnishings (floor plan) of a mobile workstation: **FUNCTIONAL** category suitable as a workstation for teleworking (all dimensions in m)
4.2 Working environment for office work at home

In addition to a desktop that is sufficiently large for the activity, an adequately dimensioned free movement area must be provided to enable alternating working postures and movements in the home office. Here, too, the dimensions of the various categories according to FBVW-401, Working in hotels, can provide guidance (see Table 1).

Sufficient daylight and visual contact to the outside should be objectives for work performed in the home office, as elsewhere. Where artificial lighting is used in a home office, it should be in keeping with the residential character of the room.

Screens should be positioned such that their surfaces are free of obtrusive reflections and glare. The workplace should be sufficiently bright (500 lux). This can be achieved by supplementing the household lighting for example with a floor lamp or desk lamp.

In order to counteract a lack of movement, work at the screen should be interrupted regularly with a change of posture or by other work. Telephone calls, for example, can be made while standing. This applies to work both in the company office and the home office.

5 Issues of work organization and mental stress

The employer must ensure that employees working from home have adequate access to company communications and information. Employees regularly working from home should be well integrated into the company's organizational structures. It is important in this context that information can be exchanged over multiple channels. Contact in person, by telephone and by video conferencing should be used to create a social environment in which the work in the home office can be effective.

Working effectively from home also requires rules for the interaction with other residents in the household. Employees working from home must be able to concentrate and be focused on their work without being distracted by family members and activities in the household.

Employees must be able to organize their working hours flexibly according to circumstances in the household, with consideration for the needs of the company. Accordingly, they should agree with their superiors at what times they are available.

Employees working from home should receive instruction on aspects including the following:

- Arrangements for working hours and availability, with statement of the working hours to be observed, breaks, responsible contacts in the company (for example should questions arise concerning occupational safety or particular situations)
- Advice on the ergonomic design of workplaces and use of the work equipment provided (e. g. positioning of the monitor, keyboard and mouse)
- Advice on ergonomic sitting postures and dynamic sitting (frequent change of sitting position; the VBG information leaflet “Health and computer work” can be referred to for this purpose)
In addition, office workers working from home should be encouraged to interrupt their work more often with short breaks for exercise. The VBG information leaflet “Exercise at the office” can be used for this purpose.

Employees who perform computer work at home must also be offered preventive occupational medical care by the company doctor in accordance with the German Ordinance on preventive occupational medical care (ArbMedVV) as defined in occupational medical rule AMR 14.1. Should working from home give rise to health complaints, employees are entitled to optional preventive medical care (in accordance with the ArbMedVV in conjunction with the German Occupational Health and Safety Act), including if appropriate by telephone or telehealth.

**Literature:**
[1] SARS-CoV-2-Arbeitsschutzstandard
[2] SARS-CoV-2-Arbeitsschutzregel

**Illustrations:**
The images used were kindly provided by the VBG Office Team.
Figure 5: DGUV Informative publication 215-442 on office lighting

**Tables:**
Table 1: VBG Office Team, excerpt from FBVW-401 „Mobile work in hotels“