Musculoskeletal Disorders (MSD)
Online Assessment Tool

All-in-one digital solution for the Manual Handling Assessment Charts (MAC), Assessment of Repetitive Tasks (ART) and Risk Assessment of Pushing and Pulling (RAPP).
Manual handling at work

As an employer, you must protect your workers from the risk of injury from hazardous manual handling in the workplace. Manual handling means transporting or supporting a load by hand or bodily force. It includes lifting, putting down, pushing, pulling, carrying or moving loads. A load can be an object, person or animal.

The law sets out how employers must deal with risks from manual handling:

- avoid hazardous manual handling, so far as is reasonably practicable
- assess the risk of injury from any hazardous manual handling operations that cannot be avoided
- reduce the risk of injury from hazardous manual handling to as low as reasonably practicable

The weight of a load is important, though the law does not set specific weight limits. In some cases, you must provide information about the weight and position of the centre of gravity of each load, if there is a risk of injury and it is reasonably practicable to do this.

Musculoskeletal disorders

Musculoskeletal disorders (MSDs) are conditions that can affect the back, joints and limbs. Employers must protect the health and safety of their workers and other people who might be affected by what they do, under the Health and Safety at Work Act.

The parts of the body most likely to be affected by MSDs are:

- the lower back
- shoulders, forearms, wrists and hands, as well as the neck
- the hips, legs, knees, ankles and feet
How to assess manual handling tasks and avoid MSDs

As an employer, you must manage the risk of MSDs in your workplace. If these risks exist, you must consider both the requirements for a general risk assessment and specific assessments of other risks, for example, manual handling, repetitive work and awkward postures.

Firstly, assess the risk of injury from any hazardous manual handling operations that cannot be avoided.

You should consider the task, the load, the working environment and individual capability, for example:

- the postures adopted
- how far the load is lifted, lowered or carried
- the frequency of the task
- the weight of the load
- the nature of the load (for example hot, sharp or slippery)
- cramped work areas
- poor floor surfaces
- poor lighting, extremes of temperature
- workers' strength, fitness and underlying medical conditions (for example a history of back problems)

Some tasks are low risk and don’t need formal assessment. There are simple filters to help you distinguish low-risk tasks from those which need a more detailed assessment.
Overview of MSD assessments and tools

There are risk assessment tools to help you identify high-risk handling operations and prioritise action to control the risks:

**Manual handling assessment charts (MAC) tool**

Designed to help users identify high-risk workplace manual handling activities. Employers and safety representatives can use the tool to assess the risks posed by lifting, carrying and team manual handling activities. It will help understand, interpret and categorise the level of risk of the various known risk factors associated with these activities using a numerical and colour coding score system.

**The assessment of repetitive tasks (ART) tool**

Designed to help risk assess tasks that require repetitive moving of the upper limbs (arms and hands). It helps you to assess some of the common risk factors in repetitive work that contribute to the development of upper limb disorders (ULDs).

Repetitive tasks are typically found in assembly, production, processing, packaging, packing and sorting work, as well as work involving regular use of hand tools.

**Risk assessment of pushing and pulling (RAPP) tool**

Designed to identify high-risk pushing and pulling operations and check the effectiveness of any risk-reduction measures. There are two types of pushing and pulling operations you can assess using this tool:

- moving loads on wheeled equipment, such as hand trolleys, pump trucks, carts or wheelbarrows
- moving loads without wheels, which might involve actions such as dragging/sliding, churning (pivoting and rolling) and rolling.
What is the new MSD Online Assessment Tool?

The MSD assessment tool is the latest tool in the range from the HSE. It combines the popular MSD assessment guides MAC, ART and RAPP and transformed them into an all-in-one digital solution.

Employers and safety representatives can use the MSD tool to easily assess the risks posed by physical, strenuous activities. The assessor can then understand, interpret, categorise and communicate the level of risk. It has been designed to simplify the process of completing each assessment, with a logical step by step approach, saving your assessors time in populating the results manually.

The tool also includes:

- The option to tailor and set demographics to fit your company structure.
- The use of a bespoke mobile app to complete the assessments offline.
- An easy to use and fully GDPR compliant system that stores all tasks and assessments completed.
- Comprehensive report for the whole organisation so you can identify priority areas.
Full Premium Version v Free Single Assessment Version

The MSD Tool is available for free to organisations so they can conduct individual MAC, ART and RAPP assessments. However, for organisations who conduct multiple assessments throughout the year or want to be able to analyse their assessments; a premium option is available.

The table below provides an outline of the differences between the two options:

<table>
<thead>
<tr>
<th>MSD Tools</th>
<th>Free</th>
<th>Premium</th>
</tr>
</thead>
<tbody>
<tr>
<td>GDPR Compliant</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Fully Secure ISO27001 (data stored in the UK)</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Assessment</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Built in easy to follow process</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Suggested control measures based on scores</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Emailed copy of completed assessment</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Assessment mobile compatible via browser</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Assessment via mobile app (offline mode)</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Organisational set demographics</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Personalisation including company logo</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Administration portal</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Set up multiple assessments</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Set up organisational demographics</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Shared and linked accounts</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Ability to download raw data</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Auto report</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Auto report with priority/focus areas</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Ability to filter auto reports by demographics</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Ability to download and share auto reports</td>
<td>-</td>
<td>Yes</td>
</tr>
<tr>
<td>Ability to access and save individual assessments</td>
<td>-</td>
<td>Yes</td>
</tr>
</tbody>
</table>
Analysing the reports for effective risk management

(Available on premium version only)

Once assessments have been completed, the MSD Tool consolidates all the assessments in one central system, so they can be easily reviewed and analysed.

Monitoring

The report categorises the completed assessments, showing what the tasks were, e.g. lift, carry or team task, the locations for where the assessments were completed, the assessors within the organisation, and date stamps to see when they were completed. This enables central management to monitor those assessments and ensure they are being completed correctly.

Prioritisation

Integrates the same structure used by HSE inspectors to prioritise tasks:

- Actual risk of serious personal injury – critical
- Significant / probable / substantial – high priority
- Significant / possible / moderate – medium priority

This data enables organisations to focus their efforts on the highest risk activities first.

Common themes

The report outlines the most common risk factors associated with each type of manual handling task. This helps identify common themes across multiple tasks and empowers organisations to identify control measures that can reduce the overall risk factor.

Adaptable reporting

In addition to the organisation report, the system includes the functionality to filter based on the demographics or task. This helps to extract the reports and send them to managers responsible for health and safety at a local level, with details of the priority areas to be addressed.

Ultimately, the MSD Tool will save central management time and effort, and will help achieve a robust manual handling risk management programme.

Sign up to our next live webinar demoing the MSD Tool -
books.hse.gov.uk