Hand-Arm Vibration Exposure Guide

Version 6, 2015















This guide contains examples of hand-arm vibration exposures measured using VJT consumables to carry out real world tasks.







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Who is this guide for?

This guide is intended to help power tool operators, supervisors, safety managers and planners to assess vibration exposures effectively and efficiently.

Why has VJ Technology provided this guide?

Power tool operators can be injured by the vibration from their machines and employers must, by law, assess and manage these risks. The Health and Safety Executive expects the risk to be assessed using information appropriate to the tool as it will be used.

Information from some sources may not be appropriate for particular tasks, may be based on free-run tests rather than real usage, or may be based on outdated single-axis measurements which under-estimate the machine vibration.

VJ Technology developed this guide to provide contractors with realistic vibration exposure examples. Management training, toolbox talks and expert guidance are also available if required.



What is in this guide?

This guide contains examples of the amount of work that can be done with VJ Technology consumables carrying out common tasks, based on real-use tests of the machines and consumables.

The information is provided using the task-based 'productivity' system developed by the UK Contractors Group, the points system developed by the Health and Safety Executive, and the more general trigger time system.

The guide also provides a brief description of Hand-Arm Vibration Syndrome and gives some practical advice on reducing the risk.



What is hand-arm vibration?

Hand-arm vibration is vibration transmitted from work processes into workers' hands and arms from hand-held power tools or handguided equipment.



When is it dangerous?

Regular and frequent exposure to hand-arm vibration can lead to permanent health effects collectively known as hand-arm vibration syndrome (HAVS), and specific diseases such as carpal tunnel syndrome and Vibration White Finger (VWF).

What are the early symptoms?

Symptoms may include:

- Tingling and numbness in the fingers;
- Not being able to feel things properly;
- · Loss of strength in the hands;
- Fingers going white (blanching) and becoming red and painful on recovery, particularly in the cold and wet, and probably only in the tips at first.

How can the tool operator reduce the risk?

- Make sure the tool and the consumable are in good condition.
- Make sure you use the right tool for the job.
- Avoid gripping the machine too hard or using too much pressure.
- Keep warm and dry at work. Wear gloves and extra clothing when it is cold.
- If you smoke, cut down before and while you are at work. Smoking affects blood flow.
- Exercise and massage your fingers during breaks.
- Try to reduce the time you use a machine in one go, perhaps by doing other tasks in between.
- Make sure you can recognise the symptoms of HAVS.

How much vibration is too much?

The Control of Vibration at Work Regulations 2005 sets two exposure levels, the daily vibration Exposure Action Value (the EAV) and the daily vibration Exposure Limit Value (the ELV).

If the the daily Exposure Action Value (EAV) is likely to be exceeded, exposure control measures and health surveillance must always be in place. These measures may also be required for lower exposures.

The Exposure Limit Value is the legal daily limit and must never be exceeded.





Pictures above courtesy of The Health and Safety Executive



| Productivity examples | | |
|--|-----------------|----------------|
| Drilling 100mm depth 40N/mm ² Concrete | Action Value | Limit Value |
| VJT 20mm SDS Max Drill Bit | 130 holes | 520 holes |
| VJT 24mm SDS Max Drill Bit | 110 holes | 470 holes |
| VJT 28mm SDS Max Drill Bit | 92 holes | 360 holes |
| VJT 32mm SDS Max Drill Bit | 110 holes | 440 holes |
| VJT 32mm SDS Max Drill Bit | Tronoies | 440 110165 |

The 'productivity' data for each tool, consumable and task gives examples of the work that can be done before reaching the daily Exposure Action Value (EAV) and the daily Exposure Limit Value (ELV).

Be aware that the values are daily exposures for this machine only.

For example, if a machine operator was halfway to the Action Level after using one machine, they would already be halfway to the Action Level when they started using another machine.

If several different machines are used during the working day then it may be easier to manage exposures using the HSE points system, explained below.

What is the trigger time?

The trigger time is the actual time that the machine is being used, it should not be confused with the overall time it takes to complete a job. Estimating the trigger time can be difficult, especially for short duration or rapidly repeated tasks such as drilling holes.



What is the 'HSE points' system?

| it 1e | HSE Points |
|----------|---------------|
| oles | 0.8 per hole |
| oles | 0.9 per hole |
| noles | 1.1 per hole |
| holes | 1 per hole |

The HSE Points system gives each task a certain number of 'points' based on both the vibration magnitude and the time taken. The EAV is equivalent to 100 HSE points. The ELV is equivalent to 400 HSE points. The advantage of this system is that exposures for different tasks using different machines can simply be added together to give a total daily exposure.

For example:

| Example Tasks Chasing 3 metres into medium/hard concrete with a Stihl TS400 using the VJT general purpose CL300 diamond blade at 3 points per metre | HSE Points 9 |
|---|--------------|
| Drilling 10 holes at 16mm diameter and around 100mm deep into the same concrete with a Makita HR3000C using a VJT SDS+ hammer drill bit at 2 points per hole | 20 |
| Total points | 29 |

The total exposure is 29 Points, a little under a third of the way to the 100-point Action Value.





What is the VJT Test Laboratory?

The VJT Test Laboratory is a manufacturer-independent test facility. The Lab is managed by Mr Martin O'Boyle, one of the UK's leading experts in the field of hand-arm vibration exposure.

The Lab was established in 2007 to provide tool users with independent, unbiased and realistic information on vibration exposure.

The VJT Test Laboratory regularly collaborates with the Health and Safety Laboratory, the scientific arm of the Health and Safety Executive.

The testing performed by the Test Lab is carried out in partnership with VJ Technology customers that use power tools in their day to day work.

What if my tool/task is not included?

If your task is similar, your experience may help you decide if an example shown is likely to be similar. If your task is different, or if you are not sure, please contact VJ Technology to arrange for an expert from the Test Laboratory to call you back. We aim to provide you with suitable guidance using performance and vibration exposure values from our own tests and from other trusted sources.

If reliable information is not available for your situation and there is a significant health risk, we are fully equipped to make the necessary measurements for you. These tests could be carried out either on-site or at our laboratory.

Important notes:

- Tasks should be planned to keep vibration exposures as low as practically possible.
- Productivity values can be influenced by many factors (tool maintenance, base material, operating behaviour, etc.) so the productivity examples provided are for guidance only.
- Tests were conducted with the consumables supplied by VJ Technology except where indicated. The consumable can affect both the vibration exposure and the speed of operation so the information in this booklet does not apply to consumables from other suppliers.
- All tests were conducted with machines and consumables that were used correctly and in good condition.
 Poor condition machines and consumables can substantially increase the operator's vibration exposure,
 reducing the amount of work they would normally carry out. Machines should be inspected regularly to
 ensure that they are in good working order and worn, blunt or damaged consumables should be replaced.
- VJ Technology is in regular contact with the Health and Safety Executive and other relevant organisations and will update the information provided in line with developments in best practice. The information in this booklet is provided in good faith to help manage vibration exposures and may be revised without notification.

Technical information

- All productivity tests were conducted according to the 'real use' standard BS EN ISO 5349-1:2001 with the accelerometers generally positioned adjacent to the forefinger and thumb as specified in the BS EN 60745 series of standards for testing electrical power tools.
- All machines were operated at full power unless the manufacturer recommended a lower setting for the application tested. Any other machine controls were set according to the manufacturer's instructions.
- The 40N/mm² concrete used was typically cast using high flint content marine aggregate and without rebar.
- All results contained in this booklet are based on manufacturer-independent tests conducted by the VJ Technology Test Laboratory except where indicated.
- Machine weight and noise pressure values, where given, are as reported by the machine manufacturer information supplied with that particular tool at the time it was tested. Standards for reporting tool weight and noise emission are regularly revised so this information should be treated with caution.
- The trigger times reported in this booklet were calculated using the worst case measurement from the manufacturer-independent tests shown on each page, unless:
 - the manufacturer's declared value in the machine handbook was clearly based on a tri-axial measurement from a reasonably realistic test, and
 - the manufacturer's declared value was greater than the worst case value measured during our manufacturer-independent tests shown on that page.
- The vibration value, used to calculate general trigger times, is marked with the appropriate test standard:
 - "EN 60745" where the manufacturer declared value was considered reasonably representative.
 - "ISO 5349" where manufacturer-independent test data obtained by VJ Technology was used.
- The current consensus from UK experts is that powder or gas actuated direct fixing tools (nailguns)
 typically expose users to individual shocks, not vibration. It is possible that the use of these tools may
 cause health effects, but it is more appropriate to assess the risk using ergonomics. Measuring and
 reporting vibration data on direct fixing tools is not appropriate. For further advice on assessment of direct
 fixing tools please contact VJ Technology.
- The information provided in this booklet is for guidance only and is correct to the best of our knowledge. However the user must satisfy themselves of the validity of the data for their application. VJ Technology will not be held responsible for any non-compliance that may occur from the use of this information.

If you require more information about vibration testing please contact VJ Technology on 01233 652550.



Example
Hand-Arm
Vibration
Exposures

| VJT SDS+ Drill Bits | | VJT Points and Chisels | |
|--|----------------------|--|----------|
| Typically drilling 100mm depth into 40N/mm² concrete Bosch GBH 18V-EC Battery Hammer Drill | 1 | Breaking 40N/mm ² concrete De Walt D25901K Demolition Hammer Hilti TE706-AVR Breaker | 38 39 |
| Bosch GBH 2-23RE Rotary Hammer Drill | 2 | Hilti TE760-ATC Combihammer | 40 |
| Bosch GBH 2-23REA Rotary Hammer Drill | 3 | Hilti TE1000 Breaker | 41 |
| Bosch GBH 24 V Battery Hammer Drill | 4 | VJT Diamond Core and Grindi | na |
| Bosch GBH 36 V-Li Battery Drill | 5 | | ı ıg |
| Bosch GBH 36 V-Li Compact Battery Drill | 6 | Drilling/grinding 40N/mm ² concrete | |
| DeWalt D25112K Rotary Hammer Drill | 7 | Hilti DD130 - Stand Mounted Core Drill | 42 |
| De Walt D25123 K Rotary Hammer Drill De Walt DC234KL Battery Hammer Drill | 8 9 | Makita PC1100 Planer | 43 |
| Hilti TE16 Rotary Hammer Drill | 10 | VJT Abrasive Discs | |
| Hilti TE25 Rotary Hammer Drill | 11 | | |
| Hilti TE2-A Battery Hammer Drill | 12 | Examples include grinding concrete and | 1 |
| Hilti TE2-M Rotary Hammer Drill | 13 | steel and cutting rebar | |
| Hilti TE30C-AVR Rotary Hammer Drill | 14 | 115mm (4") Discs | |
| Hilti TE40-AVR Combihammer | 15 | Bosch GWS 6-115 Angle Grinder | 44 |
| Hilti TE6-A Battery Hammer Drill | 16 | Hilti AG 115-7D Angle Grinder | 45 |
| Hilti TE6-A36 AVR Battery Hammer Drill | 17 | 125mm (5") Discs | |
| Hilti TE6-C Rotary Hammer Drill | 18 | Bosch GWS 10-125 Angle Grinder | 46 |
| Makita BHR261T Battery Hammer Drill | 19 | DeWalt DC415KL Battery Angle Grinder | 47 |
| Makita DHR243 Battery Hammer Drill | 20 | Hilti AG 125-A22 Battery Angle Grinder | 48 |
| Makita DHR243/EXT Battery Hammer Drill | 21 | Hilti DEG 125-D Angle Grinder | 49 |
| Makita DHR264 Battery Hammer Drill | 22 | Makita 9558NB Angle Grinder | 50 |
| Makita HR2460 Rotary Hammer Drill Makita HR2470 Rotary Hammer Drill | 23 24 | Makita GA5021C Angle Grinder | 51 |
| Makita HR2611FT Rotary Hammer Drill | 2 4 25 | 230mm (9") Discs | |
| Makita HR3000C Combihammer | 26 | Bosch GWS 22-230 LVI Angle Grinder | 52 |
| Makita HR3210FCT Rotary Hammer Drill | 27 | DeWalt D28415 Angle Grinder | 53 |
| Metabo BHE 26 Rotary Hammer Drill | 28 | DeWalt D28492 Angle Grinder | 54 |
| Spit 328 24V Battery Hammer Drill | 29 | Hilti DAG 230-D Angle Grinder | 55 |
| , | | Hilti DCG 230-D Angle Grinder | 56 |
| VJT SDS Max Drill Bits | | Makita GA9040S Angle Grinder | 57 |
| Typically drilling 100mm depth into | | 300mm (12") Discs | |
| 40N/mm ² concrete | | Stihl TS400 Petrol Saw | 58 |
| Bosch GBH 5-40 DCE Combihammer | 30 | Stihl TS410 Petrol Saw | 59 |
| DeWalt D25602K Combihammer | 31 | 356mm (14") Discs | |
| Hilti TE56-ATC Combihammer | 32 | Makita 2414NB Circular Saw | 60 |
| Hilti TE60-ATC AVR Combinammer | 33 | | - * |
| Hilti TE76P-ATC Combihammer | 34 | | |
| Hilti TE80-ATC AVR Combihammer | 35 | | |
| Makita HR4011C Combihammer | 36 | | |
| Makita HR4511C Combihammer | 37 | | |



| VJT Diamond Cutting Discs | | VJT Circular Saw Blades | |
|--|----------|--|-------------------|
| Examples include chasing into brickwork, 7N/mm² block and 40N/mm² concrete | | Examples include cutting wood, plasterboard and metal Evolution EVO180 Circular Saw | 90 |
| 115mm (4") Discs | | Hilti WSC 255-KE Circular Saw Hilti WSC 265-KE Circular Saw | 91 92 |
| Bosch GWS 6-115 Angle Grinder | 61 | Hilti WSC85 Circular Saw | 93 |
| Hilti AG 115-7D Angle Grinder | 62 | Makita 5903R Circular Saw | 94 |
| 125mm (5") Discs | | Makita LC1230 Circular Saw | 95 |
| Bosch GWS 10-125 Angle Grinder | 63 | VJT Rotary Drill / | |
| DeWalt DC415KL Battery Angle Grinder | 64 | Driver Consumables | |
| Hilti AG 125-A22 Battery Angle Grinder | 65 | | |
| Hilti DC-SE20 Wall Chaser | 66 67 | Examples include drilling and fastening | |
| Hilti DEG 125-D Angle Grinder Makita 9558NB Angle Grinder | 67 68 | masonry, metal and wood | |
| Makita GA5021C/EXT Angle Grinder | 69 | Bosch GSB 20-2 Rotary Hammer Drill | 96 |
| 230mm (9") Discs | 00 | Hilti SF151-A Battery Hammer Drill Hilti SF180-A Battery Hammer Drill | 97 98 |
| ` , | 70 | Hilti SR16 Rotary Drill/Driver | 100 |
| Bosch GWS 22-230 LVI Angle Grinder DeWalt D28415 Angle Grinder | 70 72 | Hilti UH 240-A Battery Hammer Drill | 101 |
| DeWalt D28492 Angle Grinder | 73 | Hitachi D10VF Rotary Hammer Drill | 102 |
| Hilti DAG/EXT 230-D Angle Grinder | 74 | Makita DHP456 Battery Hammer drill | 103 |
| Hilti DC 230-S Angle Grinder | 75 | Makita HP2070 Rotary Hammer Drill | 104 |
| Hilti DCG 230-D Angle Grinder | 76 | Makita TD0101F Impact Driver | 105 |
| Makita GA9040S Angle Grinder | 77 | VJT Impact Drive Fixings | |
| 300mm (12") Discs | | • | |
| Stihl TS400 Petrol Saw | 79 | Examples include installing into | |
| Stihl TS410 Petrol Saw | 80 | Concrete | 106 |
| VJT Bandsaw Blades | | Hilti SIW144-A Battery Impact Wrench Makita BTW251 Battery Impact Wrench Makita TW0350 Impact Wrench | 106 107 108 |
| Cutting rebar, scaff tube and steel angle | | · | 100 |
| Makita BPB180 | 81 | VJT Drywall Screws | |
| VJT Jigsaw Blades | | Fixing plasterboard to metal and timber stud | |
| Examples include cutting plywood, | | Bosch GSR 6-25 TE Drywall screwdriver | 109 |
| chipboard and steel | | Makita 6825R Drywall Screwdriver | 110 |
| Bosch GST 135-BCE Jigsaw | 82 | Makita 6844 Autofeed screwdriver | 111 |
| Bosch GST 2000 Jigsaw | 83 | Spit 216 Drywall screwdriver | 112 |
| Hiti WSJ 750-ET Jigsaw | 84 | Spit 216 HDi Battery drywall screwdriver | 113 |
| Hilti WSJ 850-ET Jigsaw Makita 4350FCT Jigsaw | 85 86 | VJT Sanding Sheets | |
| <u>-</u> | 00 | Sanding wood | |
| VJT Sabre Saw Blades | | Hilti WFO 280 Sander | 114 |
| Examples include cutting plywood, chipboard and steel | | Hilti WFE 450-E Sander | 115 |
| Hilti WSR 1400-PE Sabre Saw | 87 | | |
| Makita JR3050T Sabre Saw | 88 | | |
| Makita JR3070CT-AVT Sabre Saw | 89 | | |





Used with a Bosch GBH 18V-EC



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 558 holes | 0.7 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 128 holes | 514 holes | 0.8 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 106 holes | 424 holes | 0.9 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 85 holes | 342 holes | 1.2 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 91 dB(A) | 17 m/s ² | 0h 10min | 0h 41min | 9.6 |





Used with a Bosch GBH 2-23RE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 540 holes | 0.8 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 97 holes | 380 holes | 1.1 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 53 holes | 210 holes | 1.9 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 49 holes | 190 holes | 2.1 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 27 holes | 100 holes | 3.8 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.3 kg | 90 dB(A) | 16 m/s ² | 0h 11min | 0h 46min | 8.6 |





Used with a Bosch GBH 2-23REA



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 117 holes | 468 holes | 0.9 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 76 holes | 384 holes | 1.3 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 61 holes | 243 holes | 1.6 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 49 holes | 197 holes | 2.0 per hole |

Tested without dust extraction.

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.9 kg | 90 dB(A) | 18 m/s ² | 0h 09min | 0h 37min | 10.8 |





Used with a Bosch GBH 24V



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 150 holes | 620 holes | 0.7 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 110 holes | 450 holes | 0.9 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 84 holes | 330 holes | 1.2 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 54 holes | 210 holes | 1.9 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.8 kg | 91 dB(A) | 12 m/s ² | 0h 20min | 1h 20min | 4.8 |





Used with a Bosch GBH 36V-Li



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 521 holes | 0.8 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 98 holes | 392 holes | 1.0 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 73 holes | 291 holes | 1.4 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 65 holes | 259 holes | 1.5 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4.4 kg | 91 dB(A) | 19 m/s ² | 0h 08min | 0h 33min | 12 |





Used with a Bosch GBH 36V-Li Compact



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 180 holes | 730 holes | 0.6 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 150 holes | 630 holes | 0.7 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 160 holes | 650 holes | 0.7 per hole |
| VJT 12mm SDS+ drill bit Drilling 100mm depth 40N/mm² Concrete | 82 holes | 320 holes | 1.3 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.9 kg | 91 dB(A) | 12 m/s ² | 0h 20min | 1h 20min | 4.8 |





Used with a DeWalt D25112K



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 550 holes | 0.8 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 420 holes | 1 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 85 holes | 330 holes | 1.2 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 79 holes | 310 holes | 1.3 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 34 holes | 130 holes | 3 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.55 kg | 85 dB(A) | 13.9 m/s ² | 0h 15min | 1h 00min | 6.5 |





Used with a DeWalt D25123K



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 210 holes | 830 holes | 0.48 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 150 holes | 620 holes | 0.7 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 92 holes | 370 holes | 1.1 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.9 kg | 89 dB(A) | 17.8 m/s ² | 0h 9min | 0h 37min | 11 |





Used with a DeWalt DC234KL



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 700 holes | 2800 holes | 0.15 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 430 holes | 1700 holes | 0.24 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 420 holes | 1600 holes | 0.24 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.8 kg | 82 dB(A) | 8.5 m/s ² | 0h 41min | 2h 40min | 2.5 |





Used with a Hilti TE16



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 180 holes | 740 holes | 0.6 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 580 holes | 0.7 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 560 holes | 0.8 per hole |
| VJT 14mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 97 holes | 380 holes | 1.1 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 67 holes | 260 holes | 1.5 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 40 holes | 160 holes | 2.5 per hole |
| VJT 22mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 28 holes | 110 holes | 3.7 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4 kg | 89 dB(A) | 16.5 m/s ² | 0h 11min | 0h 44min | 9.1 |





Used with a Hilti TE25



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 69 holes | 270 holes | 1.5 per hole |
| VJT 14mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 64 holes | 250 holes | 1.6 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 49 holes | 190 holes | 2.1 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 27 holes | 100 holes | 3.8 per hole |
| VJT 22mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 28 holes | 110 holes | 3.6 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.9 kg | 90 dB(A) | 17.6 m/s ² | 0h 9min | 0h 38min | 11 |





Used with a Hilti TE2-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 170 holes | 700 holes | 0.6 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 180 holes | 730 holes | 0.6 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 73 holes | 290 holes | 1.4 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.9 kg | 86 dB(A) | 14.5 m/s ² | 0h 14min | 0h 57min | 7.1 |





Used with a Hilti TE2-M



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 160 holes | 670 holes | 0.6 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 530 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 430 holes | 1 per hole |
| Fischer 18x80mm U/C Bit Undercutting Shotcrete | 210 holes | 860 holes | 0.47 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 89 dB(A) | 16 m/s ² | 0h 11min | 0h 46min | 8.6 |





Used with a Hilti TE30C-AVR



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 167 holes | 658 holes | 0.6 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 132 holes | 527 holes | 0.8 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 107 holes | 429 holes | 0.9 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 45 holes | 179 holes | 2.2 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4.2 kg | 99 dB(A) | 12 m/s ² | 0h 20min | 1h 23min | 4.8 |





Used with a Hilti TE40-AVR



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 430 holes | 1 per hole |
| VJT 14mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 99 holes | 390 holes | 1.1 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 410 holes | 1 per hole |
| VJT 18mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 88 holes | 350 holes | 1.2 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 71 holes | 280 holes | 1.5 per hole |
| VJT 22mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 40 holes | 160 holes | 2.6 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.6 kg | 94 dB(A) | 15.6 m/s ² | 0h 12min | 0h 49min | 8.1 |





Used with a Hilti TE6-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 580 holes | 0.7 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 410 holes | 1 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 100 holes | 410 holes | 1 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.7 kg | 83 dB(A) | 9.9 m/s ² | 0h 30min | 2h 0min | |





Used with a Hilti TE6-A36 AVR



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 334 holes | 1337 holes | 0.3 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 270 holes | 1079 holes | 0.4 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 226 holes | 902 holes | 0.4 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 178 holes | 712 holes | 0.6 per hole |

| Tool | | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|------|----------|------------|---------------------|---------------------|----------------|
| Weig | | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4 kg | 88 dB(A) | 9 m/s² | 0h 37min | 2h 28min | 2.7 |





Used with a Hilti TE6-C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 150 holes | 620 holes | 0.7 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 410 holes | 1 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 94 holes | 370 holes | 1.1 per hole |
| VJT 14mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 66 holes | 260 holes | 1.6 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 47 holes | 180 holes | 2.2 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.8 kg | 87 dB(A) | 14.5 m/s ² | 0h 14min | 0h 57min | 7 |





Used with a Makita BHR261T



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 170 holes | 710 holes | 0.6 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 430 holes | 1 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 130 holes | 530 holes | 0.8 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4.8 kg | 92 dB(A) | 15 m/s ² | 0h 13min | 0h 53min | 7.5 |





Used with a Makita DHR243



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 190 holes | 790 holes | 0.50 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 160 holes | 650 holes | 0.61 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 120 holes | 510 holes | 0.78 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 80 holes | 340 holes | 1.16 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.4 kg | 90 dB(A) | 13 m/s ² | 0h 17min | 1h 11min | |





Used with a Makita DHR243 with on-tool dust extraction



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 220 holes | 895 holes | 0.45 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 185 holes | 750 holes | 0.53 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 140 holes | 560 holes | 0.71 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 95 holes | 390 holes | 1.01 per hole |

Tested with dust extraction.

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.4 kg | 90 dB(A) | 13 m/s ² | 0h 17min | 1h 11min | |





Used with a Makita DHR264



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 180 holes | 720 holes | 0.55 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 110 holes | 460 holes | 0.86 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 110 holes | 440 holes | 0.90 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 400 holes | 0.99 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4.7 kg | 94 dB(A) | 15.5 m/s ² | 0h 12min | 0h 49min | 8 |





Used with a Makita HR2460



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 110 holes | 440 holes | 0.9 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 93 holes | 370 holes | 1.1 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 86 holes | 340 holes | 1.2 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 69 holes | 270 holes | 1.5 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.5 kg | 90 dB(A) | 15.5 m/s ² | 0h 12min | 0h 49min | |





Used with a Makita HR2470



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 550 holes | 0.8 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 120 holes | 490 holes | 0.9 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 110 holes | 470 holes | 0.9 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 90 dB(A) | 15.5 m/s ² | 0h 12min | 0h 49min | |





Used with a Makita HR2611FT



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 185 holes | 750 holes | 0.53 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 155 holes | 625 holes | 0.64 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 120 holes | 490 holes | 0.81 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 410 holes | 0.97 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 55 holes | 225 holes | 1.75 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 3 kg | 90 dB(A) | 13 m/s ² | 0h 17min | 1h 10min | 5.7 |





Used with a Makita HR3000C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 560 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 98 holes | 390 holes | 1.1 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 62 holes | 240 holes | 1.7 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 45 holes | 170 holes | 2.3 per hole |
| VJT 26mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 19 holes | 74 holes | 5.4 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 4.6 kg | 89 dB(A) | 18.5 m/s ² | 0h 8min | 0h 35min | 12 |





Used with a Makita HR3210FCT



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 350 holes | 1400 holes | 0.29 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 260 holes | 1000 holes | 0.39 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 220 holes | 910 holes | 0.44 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 100 holes | 430 holes | 1 per hole |
| VJT 20mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 89 holes | 350 holes | 1.2 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5 kg | 89 dB(A) | 10.2 m/s ² | 0h 29min | 1h 50min | 3.5 |





SDS+ Hammer Drill Bits

Used with a Metabo BHE 26



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 250 holes | 1000 holes | 0.39 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 160 holes | 650 holes | 0.7 per hole |
| VJT 10mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 540 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 97 holes | 380 holes | 1.1 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 44 holes | 170 holes | 2.3 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 87 dB(A) | 12 m/s ² | 0h 20min | 1h 20min | 4.8 |





SDS+ Hammer Drill Bits

Used with a Spit 328 24V



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 6mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 570 holes | 0.7 per hole |
| VJT 8mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 140 holes | 550 holes | 0.8 per hole |
| VJT 12mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 16mm SDS+ Drill Bit Drilling 100mm depth 40N/mm² Concrete | 67 holes | 260 holes | 1.6 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 3.7 kg | dB(A) | 10.4 m/s ² | 0h 27min | 1h 50min | 3.6 |





Used with a Bosch GBH 5-40DCE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm² Concrete | 54 holes | 217 holes | 1.8 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 48 holes | 192 holes | 2.1 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 32 holes | 130 holes | 3.1 per hole |
| VJT 32mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 24 holes | 95 holes | 4.2 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.8 kg | 93 dB(A) | 13 m/s ² | 0h 17min | 1h 11min | 5.6 |





Used with a DeWalt D25602K



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 42 holes | 170 holes | 2.4 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 40 holes | 160 holes | 2.5 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 36 holes | 140 holes | 2.8 per hole |
| VJT 32mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 28 holes | 110 holes | 3.6 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.9 kg | 93 dB(A) | 14.6 m/s ² | 0h 14min | 0h 56min | 7.1 |





Used with a Hilti TE56-ATC



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 18mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 51 holes | 200 holes | 2 per hole |
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 55 holes | 220 holes | 1.9 per hole |
| VJT 22mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 52 holes | 200 holes | 2 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 47 holes | 180 holes | 2.2 per hole |
| VJT 26mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 37 holes | 140 holes | 2.8 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 38 holes | 150 holes | 2.7 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.6 kg | 92 dB(A) | 13.1 m/s ² | 0h 17min | 1h 0min | 5.8 |





Used with a Hilti TE60-ATC



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| 22mm Cavity Wall Bit Drilling 100mm depth 7N/mm ² Concrete | 400 holes | 1600 holes | 0.25 per hole |
| 26mm Cavity Wall Bit Drilling 100mm depth 7N/mm ² Concrete | 290 holes | 1100 holes | 0.34 per hole |
| 26mm Cavity Wall Bit Drilling 100mm depth 40N/mm² Concrete | 79 holes | 310 holes | 1.3 per hole |
| 22mm Cavity Wall Bit Drilling through Common Brick | 950 holes | 3800 holes | 0.11 per hole |
| 26mm Cavity Wall Bit Drilling through Common Brick | 690 holes | 2700 holes | 0.15 per hole |

| | Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---|--------|----------|--------------------|---------------------|---------------------|----------------|
| | Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 7 | 7.4 kg | 99 dB(A) | 9 m/s ² | 0h 37min | 2h 20min | 2.7 |





Used with a Hilti TE76P-ATC



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 44 holes | 170 holes | 2.3 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 39 holes | 150 holes | 2.6 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 27 holes | 100 holes | 3.8 per hole |
| VJT 32mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 27 holes | 100 holes | 3.8 per hole |
| VJT 38mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 13 holes | 52 holes | 7.7 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 8.3 kg | 91 dB(A) | 15.4 m/s ² | 0h 12min | 0h 50min | 8 |





Used with a Hilti TE80-ATC



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 66 holes | 260 holes | 1.6 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 44 holes | 170 holes | 2.3 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 44 holes | 170 holes | 2.3 per hole |
| VJT 32mm SDS Max Drill Bit Drilling 100mm depth 40N/mm² Concrete | 32 holes | 120 holes | 3.2 per hole |
| VJT Breaker Point Breaking 40N/mm² Concrete | 38 min | 2h 30m | 2.7 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|-----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 10.2 kg | 100 dB(A) | 12.1 m/s ² | 0h 20min | 1h 20min | 5 |





Used with a Makita HR4011C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 18mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 230 holes | 940 holes | 0.43 per hole |
| VJT 22mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 160 holes | 660 holes | 0.6 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 26mm SDS Max Drill Bit Drilling 100mm depth 40N/mm² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 100 holes | 420 holes | 1 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.4 kg | 90 dB(A) | 8.1 m/s ² | 0h 46min | 3h 00min | 2.2 |





Used with a Makita HR4511C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 20mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 130 holes | 520 holes | 0.8 per hole |
| VJT 24mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 110 holes | 470 holes | 0.9 per hole |
| VJT 28mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 92 holes | 360 holes | 1.1 per hole |
| VJT 32mm SDS Max Drill Bit Drilling 100mm depth 40N/mm ² Concrete | 110 holes | 440 holes | 1 per hole |
| VJT Breaker Point Breaking 40N/mm² Concrete | 40 mins | 2h 40m | 2.5 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 8.4 kg | 94 dB(A) | 8.6 m/s ² | 0h 40min | 2h 40min | 2.5 |





SDS Max Points and Chisels

Used with a DeWalt D25901K



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---------------------------------------|--------------|-------------|-------------|
| VJT Breaker Point | | | |
| Breaking 40N/mm ² Concrete | 23 min | 1h 30m | 4.3 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 10.9 kg | 89 dB(A) | 11.2 m/s ² | 0h 23min | 1h 30min | 4.3 |





SDS Max Points and Chisels

Used with a Hilti TE706-AVR



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-------------|
| VJT Breaker Point Breaking 40N/mm ² Concrete | 33 min | 2h 10m | 3.1 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 7.9 kg | 87 dB(A) | 9.5 m/s ² | 0h 33min | 2h 10min | 3.1 |





SDS Max Points and Chisels

Used with a Hilti TE76P-ATC



Productivity examples

| n Value Limit Valu | HSE Points |
|--------------------|----------------|
| mine 54 mine | 7.4 per minute |
| | mins 54 mins |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 8.3 kg | 91 dB(A) | 14.8 m/s ² | 0h 13min | 0h 54min | 7.4 |



Used with a Hilti TE1000-AVR



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---------------------------------------|--------------|-------------|------------|
| Breaker Point | | | |
| Breaking 40N/mm ² Concrete | 20 min | 1h 20m | 5 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 11.8 kg | 87 dB(A) | 12.2 m/s ² | 0h 20min | 1h 20min | 5 |





Diamond Core

Used with a Hilti DD130-Stand Mounted Core Drill



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---------------------------------------|--------------|-------------|-------------|
| VJT 82mm Diamond Core | | | |
| Drilling 40N/mm ² Concrete | 55 min | 3h 40m | 1.8 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|-----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 20.3 kg | 102 dB(A) | 7.3 m/s ² | 0h 55min | 3h 40min | 1.8 |



Diamond Grinding Discs

Used with a Makita PC1100



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|------------|
| VJT 115mm VCDP Diamond Disc Surface grinding 40N/mm ² Concrete | 20 min | 1h 20min | 5 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.3 kg | 88 dB(A) | 12.1 m/s ² | 0h 20min | 1h 20min | 5 |





Used with a Bosch GWS 6-115



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 115mm Metal Grind Disc Surface grinding 6mm Durasteel | 54 min | 3h 30m | 1.9 per min |
| VJT 115mm Metal Grind Disc Surface grinding Mild Steel | 46 min | 3h 00m | 2.2 per min |
| VJT 115mm Metal Cut Disc Cutting through 12mm Rebar | 450 cuts | 1800 cuts | 0.22 per cut |
| VJT 115mm Metal Cut Disc Cutting through 1mm Mild Steel | 82 metres | 320 metres | 1.3 per metre |
| VJT 115mm Metal Cut Disc Cutting through 1.5mm Stainless steel plate | 100 metres | 410 metres | 1 per metre |
| VJT 115mm Stone Cut Disc Cutting 25mm depth Common Brick | 35 metres | 130 metres | 2.9 per metre |
| VJT 115mm Stone Cut Disc Cutting 15mm depth 7N/mm ² Concrete Block | 11 metres | 44 metres | 9.2 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.4 kg | dB(A) | 8 m/s ² | 0h 46min | 3h 00min | 2.2 |





Used with a Hilti AG 115-7D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 115mm Metal Cut Disc Cutting through 2mm Mild Steel | 51 metres | 204 metres | 1.96 per metre |
| VJT 115mm Metal Cut Disc Cutting through 12mm Rebar | 1480 cuts | 5940 cuts | 0.07 per cut |
| VJT 115mm Metal Grind Disc Surface grinding Mild Steel | 3h 10m | >8 hrs | 0.52 per min |
| VJT 115mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 4h 30m | >8 hrs | 0.37 per min |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.0 kg | 85 dB(A) | 6.5 m/s ² | 1h 11min | 4h 44min | 1.4 |





Used with a Bosch GWS 10-125



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 1400 cuts | 5800 cuts | 0.07 per cut |
| VJT 125mm Metal Cut Disc Cutting through 16mm Rebar | 510 cuts | 2000 cuts | 0.2 per cut |
| VJT 125mm Metal Cut Disc Cutting through 3mm Mild Steel | 23 metres | 91 metres | 4.5 per metre |
| VJT 125mm Metal Grind Disc Surface grinding Mild Steel | 5h 30m | >8 hrs | 0.3 per min |
| VJT 125mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 2h 30m | >8 hrs | 0.7 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.7 kg | dB(A) | 6.2 m/s ² | 1h 10min | 5h 10min | 1.3 |



Used with a DeWalt DC415KL



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 2100 cuts | 8700 cuts | 0.046 per cut |
| VJT 125mm Metal Cut Disc Cutting through 16mm Rebar | 1500 cuts | 6100 cuts | 0.07 per cut |
| VJT 125mm Metal Grind Disc Surface grinding Mild Steel | >8 hrs | >8 hrs | 0.16 per min |
| VJT 125mm Stone Grind Disc Surface grinding 40N/mm² Concrete | >8 hrs | >8 hrs | 0.2 per min |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.5 kg | 79 dB(A) | 5.8 m/s ² | 1h 20min | 5h 50min | 1.2 |





Used with a Hilti AG 125-A22



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 890 cuts | 3560 cuts | 0.11 per cut |
| VJT 125mm Metal Cut Disc Cutting through 16mm Rebar | 710 cuts | 2860 cuts | 0.14 per cut |
| VJT 125mm Metal Grind Disc Surface grinding Mild Steel | >8 hrs | >8 hrs | 0.15 per min |
| VJT 125mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 5h 20m | >8 hrs | 0.30 per min |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.7 kg | 83 dB(A) | 3.8 m/s ² | 3h 27min | > 8h | 0.5 |





Used with a Hilti DEG 125-D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 520 cuts | 2000 cuts | 0.2 per cut |
| VJT 125mm Metal Cut Disc Cutting through 20mm Rebar | 390 cuts | 1500 cuts | 0.26 per cut |
| VJT 125mm Metal Grind Disc Surface grinding Mild Steel | 2h 30m | >8 hrs | 0.7 per min |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.2 kg | 89 dB(A) | 7 m/s ² | 1h 00min | 4h 00min | 1.7 |





Used with a Makita 9558NB



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 590 cuts | 2300 cuts | 0.17 |
| VJT 125mm Metal Cut Disc Cutting through 16mm Rebar | 230 cuts | 950 cuts | 0.43 |
| VJT 125mm Metal Cut Disc Cutting through 20mm Rebar | 140 cuts | 570 cuts | 0.7 per cut |
| VJT 125mm Metal Grind Disc Surface grinding Mild Steel | 2h 20m | >8 hrs | 0.7 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.1 kg | 86 dB(A) | 7 m/s ² | 1h 00min | 4h 00min | 1.7 |





Used with a Makita GA5021C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 125mm Metal Cut Disc Cutting through 12mm Rebar | 2220 cuts | 8885 cuts | 0.045 per cut |
| VJT 125mm Metal Cut Disc Cutting through 16mm Rebar | 1610 cuts | 6445 cuts | 0.062 per cut |
| VJT 125mm Metal Cut Disc Cutting through 20mm Rebar | 285 cuts | 1155 cuts | 0.35 per cut |
| VJT 125mm Metal Grind Disc Surface grinding | >8 hrs | >8 hrs | 0.16 per min |
| VJT 125mm Stone Grind Disc Surface grinding | 6h 20m | >8 hrs | 0.27 per min |

| | Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---|--------|----------|----------------------|---------------------|---------------------|----------------|
| | Veight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2 | .9 kg | 90 dB(A) | 8.5 m/s ² | 0h 41min | 2h 46min | 2.41 |





Used with a Bosch GWS 22-230 LVI



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 140 cuts | 590 cuts | 0.7 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 84 cuts | 330 cuts | 1.2 per cut |
| VJT 230mm Metal Grind Disc Surface grinding Mild Steel | 52 min | 3h 20min | 2 per min |
| VJT 230mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 1h 10min | 4h 40min | 1.4 per min |
| VJT 230mm Metal Cut Disc Cutting through 16mm Rebar | 270 cuts | 1000 cuts | 0.37 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.4 kg | 92 dB(A) | 10.2 m/s ² | 0h 28min | 1h 50min | 3.5 |





Used with a DeWalt D28415



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 680 cuts | 2700 cuts | 0.15 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 490 cuts | 1900 cuts | 0.21 per cut |
| VJT 230mm Metal Cut Disc Cutting through Steel Scaffold Tube | 150 cuts | 620 cuts | 0.7 per cut |
| VJT 230mm Metal Grind Disc Surface grinding Mild Steel | 5h 0m | >8 hrs | 0.34 per min |
| VJT 230mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 5h 30m | >8 hrs | 0.31 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.1 kg | 91 dB(A) | 7.4 m/s ² | 0h 54min | 3h 30min | 1.9 |





Used with a DeWalt D28492



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 580 cuts | 2300 cuts | 0.18 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 310 cuts | 1200 cuts | 0.32 per cut |
| VJT 230mm Metal Cut Disc Cutting through Steel Scaffold Tube | 270 cuts | 1000 cuts | 0.37 per cut |
| VJT 230mm Metal Grind Disc Surface grinding Mild Steel | 1h 30m | 6h 0m | 1.2 per minute |
| VJT 230mm Stone Grind Disc Surface grinding 40N/mm ² Concrete | 1h 40m | 7h 0m | 1 per minute |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 5.5 kg | 92 dB(A) | 7.6 m/s ² | 0h 51min | 3h 20min | 2 |





Used with a Hilti DAG 230-D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 300 cuts | 1230 cuts | 0.32 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 200 cuts | 830 cuts | 0.48 per cut |
| VJT 230mm Metal Cut Disc Cutting through Steel scaffold tube | 210 cuts | 860 cuts | 0.46 per cut |
| VJT 230mm Metal Grind Disc Surfacing grinding Mild Steel | 1h 10m | 4h 50m | 1.37 per min |
| VJT 230mm Stone Grind Disc Surface grinding 40N/mm² Concrete | 1h 30m | 6h 10m | 1.07 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.9 kg | 90 dB(A) | 7 m/s ² | 1h 01min | 4h 04min | 1.6 |





Used with a Hilti DCG 230-D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|--------------|
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 680 cuts | 2700 cuts | 0.15 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 790 cuts | 3100 cuts | 0.13 per cut |
| VJT 230mm Metal Grind Disc Surface grinding Mild Steel | 2h 0m | >8 hrs | 0.9 per min |
| VJT 230mm Stone Cut Disc Cutting through Kerbstone | 200 cuts | 820 cuts | 0.49 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.4 kg | 90 dB(A) | 5.3 m/s ² | 1h 40min | 6h 50min | 1 |





Used with a Makita GA9040S



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 230mm Metal Cut Disc Cutting through 16mm Rebar | 1600 cuts | 6700 cuts | 0.06 per cut |
| VJT 230mm Metal Cut Disc Cutting through 20mm Rebar | 1100 cuts | 4700 cuts | 0.09 per cut |
| VJT 230mm Metal Cut Disc Cutting through 25mm Rebar | 430 cuts | 1700 cuts | 0.24 per cut |
| VJT 230mm Metal Cut Disc Cutting through 40mm Rebar | 61 cuts | 240 cuts | 0.17 per cut |
| VJT 230mm Metal Cut Disc Cutting through Steel scaffold tube | 340 cuts | 1300 cuts | 0.29 per cut |
| VJT 230mm Metal Grind Disc Surface grinding Mild Steel | 2h 0m | >8 hrs | 0.8 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.6 kg | 90 dB(A) | 7 m/s ² | 1h 00min | 4h 00min | 1.7 |





Used with a Stihl TS400



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 305mm Metal Cut Disc Cutting through 12mm Rebar | 3000 cuts | 12000 cuts | 0.033 per cut |
| VJT 305mm Metal Cut Disc Cutting through 16mm Rebar | 1800 cuts | 7300 cuts | 0.06 per cut |
| VJT 305mm Metal Cut Disc Cutting through 25mm Rebar | 690 cuts | 2700 cuts | 0.15 per cut |
| VJT 305mm Metal Cut Disc Cutting through Steel pipe (OD 33mm) | 500 cuts | 2000 cuts | 0.2 per cut |
| VJT 305mm Stone Cut Disc Cutting 20mm depth 40N/mm ² Concrete | 14 metres | 56 metres | 7.2 per metre |
| VJT 305mm Stone Cut Disc Cutting 50mm depth 7N/mm ² Concrete Block | 30 metres | 120 metres | 3.3 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 9.1 kg | 99 dB(A) | 5.8 m/s ² | 1h 20min | 5h 50min | 1.2 |





Used with a Stihl TS410



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 300mm Metal Cut Disc Cutting through 12mm Rebar | 6600 cuts | 26000 cuts | 0.016 per cut |
| VJT 300mm Metal Cut Disc Cutting through 16mm Rebar | 5200 cuts | 21000 cuts | 0.019 per cut |
| VJT 300mm Metal Cut Disc Cutting through 20mm Rebar | 3000 cuts | 12000 cuts | 0.034 per cut |
| VJT 300mm Metal Cut Disc Cutting through 25mm Rebar | 2100 cuts | 8400 cuts | 0.048 per cut |
| VJT 300mm Metal Cut Disc Cutting through Steel scaffold tube | 2400 cuts | 9600 cuts | 0.042 per cut |
| VJT 300mm Stone Cut Disc Cutting 30mm depth 7N/mm ² Concrete Block | 71 metres | 280 metres | 1.5 per metre |
| VJT 300mm Stone Cut Disc Cutting 20mm depth 40N/mm ² Concrete | 36 metres | 140 metres | 2.8 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 9.4 kg | 98 dB(A) | 3.5 m/s ² | 4h 10min | > 8h | 0.4 |





Used with a Makita 2414NB



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---------------------------------------|--------------|-------------|-------------|
| VJT 356mm Metal Cut Disc | | | |
| Cutting through 50x50x6mm Steel angle | 140 cuts | 570 cuts | 0.7 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 16.4 kg | 86 dB(A) | 8.2 m/s ² | 0h 44min | 2h 50min | 2.3 |





115mm/4.5" Diamond Discs

Used with a Bosch GWS 6-115



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 115mm CL115 Diamond Disc Cutting 25mm depth Common Brick | 100 metres | 430 metres | 1 per metre |
| VJT 115mm CL115 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 54 metres | 210 metres | 1.9 per metre |
| VJT 115mm CL115 Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 23 metres | 94 metres | 4.3 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.4 kg | dB(A) | 6.6 m/s ² | 1h 00min | 4h 30min | |





115mm/4.5" Diamond Discs

Used with a Hilti AG 115-7D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 115mm VAP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 61 metres | 243 metres | 1.64 per metre |
| VJT 115mm CL115 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 123 metres | 492 metres | 0.81 per metre |
| VJT 115mm CL115 Diamond Disc Cutting 25mm depth London Brick | 160 metres | 640 metres | 0.62 per metre |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.0 kg | 85 dB(A) | 6.5 m/s ² | 1h 11min | 4h 44min | 1.4 |





125mm/5" Diamond Discs

Used with a Bosch GWS 10-125



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth Common Brick | 89 metres | 350 metres | 1.2 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 87 metres | 350 metres | 1.2 per metre |
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete Block | 18 metres | 74 metres | 5.5 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.7 kg | dB(A) | 9.3 m/s ² | 0h 34min | 2h 10min | 2.9 |





Used with a DeWalt DC415KL



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 110 metres | 440 metres | 0.9 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth Common Brick | 120 metres | 500 metres | 0.8 per metre |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 3.5 kg | 79 dB(A) | 5.8 m/s ² | 1h 20min | 5h 50min | 1.2 |





Used with a Hilti AG 125-A22



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 18 metres | 71 metres | 5.64 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 256 metres | 1025 metres | 0.39 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth London Brick | 144 metres | 577 metres | 0.69 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.7 kg | 83 dB(A) | 6.3 m/s ² | 1h 15min | 5h 02min | |





Used with a Hilti DC-SE20



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth Common Brick Masonry | 110 metres | 440 metres | 1 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 71 metres | 280 metres | 1.5 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Thermalite Block | 140 metres | 590 metres | 0.7 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|-----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.6 kg | 104 dB(A) | 6.1 m/s ² | 1h 20min | 5h 20min | |





Used with a Hilti DEG 125-D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT CL125 Diamond Disc | | | |
| Cutting 25mm depth 40N/mm ² Concrete Block | 23 metres | 91 metres | 4.4 per metre |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.2 kg | 89 dB(A) | 7 m/s ² | 1h 00min | 4h 00min | 1.7 |





Used with a Makita 9558NB



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 125mm VMP Diamond Disc Cutting 25mm depth Common Brick | 72 metres | 280 metres | 1.4 per metre |
| VJT CL125 Diamond Disc Cutting 25mm depth Common Brick | 69 metres | 270 metres | 1.5 per metre |
| VJT ECOVJ Diamond Disc Cutting 25mm depth Common Brick | 200 metres | 830 metres | 0.49 per metre |
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 7N/mm² Concrete Block | 60 metres | 240 metres | 1.7 per metre |
| VJT CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 52 metres | 200 metres | 2 per metre |
| VJT 125mm ECOVJ Diamond Disc Cutting 25mm depth 7N/mm² Concrete Block | 150 metres | 630 metres | 0.7 per metre |
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete Block | 12 metres | 48 metres | 8.5 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.1 kg | 86 dB(A) | 10.3 m/s ² | 0h 28min | 1h 50min | 3.6 |





Used with a Makita GA5021C



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 170 metres | 680 metres | 0.59 per metre |
| VJT 125mm CL125 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 350 metres | 1410 metres | 0.28 per metre |
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 140 metres | 565 metres | 0.71 per metre |
| VJT 125mm VMP Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 215 metres | 860 metres | 0.47 per metre |

Tested with Makita 196845-3 dust collecting wheel guard

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.9 kg | 90 dB(A) | 8.5 m/s ² | 0h 41min | 2h 46min | 2.41 |





Used with a Bosch GWS 22-230 LVI



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 230mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 11 metres | 44 metres | 9.1 per metre |
| VJT 230mm VMC Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 6 metres | 25 metres | 16 per metre |
| VJT 230mm VMC Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 10 metres | 38 metres | 11 per metre |
| VJT 230mm CL230 Diamond Disc Cutting 50mm depth 7N/mm² Concrete Block | 41 metres | 160 metres | 2.5 per metre |
| VJT 230mm ECOVJ Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 60 metres | 240 metres | 1.7 per metre |
| VJT 230mm CL230 Diamond Disc Cutting through Common (Wiston) red brick | 370 bricks | 1400 bricks | 0.27 per brick |
| VJT 230mm ECOVJ Diamond Disc Cutting through Common (Wiston) red brick | 570 bricks | 2200 bricks | 0.18 per brick |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.4 kg | 92 dB(A) | 9.9 m/s ² | 0h 30min | 2h 00min | 3.3 |





Used with a Bosch GWS 22-230 LVI



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 230mm VMC Diamond Disc Cutting through Common (Wiston) red brick | 210 bricks | 850 bricks | 0.47 per brick |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.4 kg | 92 dB(A) | 9.9 m/s ² | 0h 30min | 2h 00min | 3.3 |





Used with a DeWalt D28415



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 230mm CL230 Diamond Disc Cutting widthways through Common Brick masonry | 1200 bricks | 5000 bricks | 0.08 per brick |
| VJT 230mm CL230 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 300 metres | 1200 metres | 0.33 per metre |
| VJT 230mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 36 metres | 140 metres | 2.8 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 6.1 kg | 91 dB(A) | 6.7 m/s ² | 1h 00min | 4h 30min | |





Used with a DeWalt D28492



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 230mm CL230 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 97 metres | 390 metres | 1.1 per metre |
| VJT 230mm CL230 Diamond Disc Cutting widthways through Common Brick masonry | 580 cuts | 2300 cuts | 0.18 per cut |
| VJT 230mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 16 metres | 66 metres | 6.1 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.5 kg | 92 dB(A) | 9.2 m/s ² | 0h 35min | 2h 20min | |





Used with a Hilti DAG 230-D/DC-EX 230



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 230mm VMP Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 60 metres | 260 metres | 1.50 per metre |
| VJT 230mm VMP Diamond Disc Cutting through 50mm kerbstone | 280 cuts | 1150 cuts | 0.35 per cut |
| VJT 230mm CL230 Diamond Disc Cutting 25mm depth 7N/mm ² Concrete Block | 140 metres | 580 metres | 0.69 per metre |
| VJT 230mm CL230 Diamond Disc Cutting 25mm depth London Brick | 100 metres | 400 metres | 0.99 per metre |

Tested with DC-EX 230 cutting guard.

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 5.9 kg | 90 dB(A) | 6 m/s ² | 1h 23min | 5h 33min | 1.2 |





Used with a Hilti DC 230-S



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 230mm CL230 Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 10 metres | 41 metres | 10 per metre |
| VJT 230mm VMP Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 6 metres | 25 metres | 16 per metre |
| VJT 230mm CL230 Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 26 metres | 100 metres | 3.9 per metre |
| VJT 230mm VPP Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 40 metres | 160 metres | 2.5 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.1 kg | 92 dB(A) | 11.6 m/s ² | 0h 22min | 1h 20min | |





Used with a Hilti DCG 230-D



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 230mm CL230 Diamond Disc Cutting 25mm depth 40N/mm ² Concrete | 36 metres | 140 metres | 2.8 per metre |
| VJT 230mm CL230 Diamond Disc Cutting through Kerbstone | 510 cuts | 2000 cuts | 0.2 per cut |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 5.4 kg | 90 dB(A) | 5 m/s ² | 2h 00min | > 8h | 0.9 |





Used with a Makita GA9040S



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT 230mm VMC Diamond Disc Cutting 50mm depth 7N/mm² Concrete Block | 32 metres | 120 metres | 3.2 per metre |
| VJT 230mm VPP Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 74 metres | 290 metres | 1.4 per metre |
| VJT 230mm CL230 Diamond Disc Cutting 50mm depth 7N/mm ² Concrete Block | 34 metres | 130 metres | 3 per metre |
| VJT 230mm ECOVJ Diamond Disc Cutting 50mm depth 7N/mm² Concrete Block | 56 metres | 220 metres | 1.8 per metre |
| VJT 230mm VMC Diamond Disc Cutting through Common Brick | 280 bricks | 1100 bricks | 0.36 per brick |
| VJT 230mm CL230 Diamond Disc Cutting through Common Brick | 540 bricks | 2100 bricks | 0.19 per brick |
| VJT 230mm ECOVJ Diamond Disc Cutting through Common Brick | 480 bricks | 1900 bricks | 0.21 per brick |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.6 kg | 90 dB(A) | 10.1 m/s ² | 0h 29min | 1h 50min | 3.5 |





Used with a Makita GA9040S



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 230mm CL230 Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 17 metres | 68 metres | 5.9 per metre |
| VJT 230mm VMX Diamond Disc Cutting through 40mm Rebar | 39 cuts | 150 cuts | 2.6 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 5.6 kg | 90 dB(A) | 6.3 m/s ² | 1h 10min | 5h 00min | 1.4 |





Used with a Stihl TS400



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 300mm CL300 Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 33 metres | 130 metres | 3.1 per minute |
| VJT 300mm VMC Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 53 metres | 210 metres | 1.9 per minute |
| VJT 300mm VMX Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 77 metres | 300 metres | 1.3 per minute |
| VJT 300mm CL300 Diamond Disc Cutting 100mm depth 7N/mm ² Concrete Block | 110 metres | 470 metres | 0.9 per minute |
| VJT 300mm VMC Diamond Disc Cutting 100mm depth 7N/mm² Concrete Block | 120 metres | 510 metres | 0.8 per minute |
| VJT 300mm VMX Diamond Disc Cutting 100mm depth 7N/mm² Concrete Block | 120 metres | 500 metres | 0.8 per minute |
| VJT 300mm VPP Diamond Disc Cutting 100mm depth 7N/mm ² Concrete Block | 120 metres | 500 metres | 0.8 per minute |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 9.1 kg | 99 dB(A) | 5 m/s ² | 2h 00min | > 8h | 0.9 |





Used with a Stihl TS410



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 300mm CL300 Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 120 metres | 510 metres | 0.8 per metre |
| VJT 300mm VMC Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 130 metres | 550 metres | 0.8 per metre |
| VJT 300mm VMX Diamond Disc Cutting 50mm depth 40N/mm ² Concrete | 210 metres | 870 metres | 0.46 per metre |
| VJT 300mm CL300 Diamond Disc Cutting 100mm depth 7N/mm ² Concrete Block | 230 metres | 930 metres | 0.43 per metre |
| VJT 300mm VPP Diamond Disc Cutting 100mm depth 7N/mm² Concrete Block | 240 metres | 980 metres | 0.41 per metre |
| VJT 300mm VMX Diamond Disc Cutting through 40mm Rebar | 110 cuts | 450 cuts | 0.9 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 9.4 kg | 98 dB(A) | 3.9 m/s ² | 3h 10min | > 8h | 0.6 |





Band Saw Blades

Used with a Makita BPB180



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 7925556-A Band Saw blade Cutting Steel scaffold tube | 4900 cuts | 19000 cuts | 0.021 per cut |
| VJT 7925556-A Band Saw blade Cutting 50x50x6mm Steel angle | 2900 cuts | 11000 cuts | 0.034 per cut |
| VJT 7925556-A Band Saw blade Cutting 12mm Rebar | 13000 cuts | 54000 cuts | 0.008 per cut |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 6.4 kg | 81 dB(A) | 2.5 m/s ² | > 8h | > 8h | 0.21 |





Jigsaw Blades

Used with a Bosch GST 135-BCE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT T118AHM Jigsaw Blade Cutting through 6mm Durasteel | 180 metres | 740 metres | 0.6 per metre |
| VJT T118AHM Jigsaw Blade Cutting through 9.5mm Durasteel | 180 metres | 740 metres | 0.6 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.7 kg | 84 dB(A) | 4.3 m/s ² | 2h 40min | > 8h | 0.7 |





Jigsaw Blades

Used with a Bosch GST 2000



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT T118AHM Jigsaw Blade Cutting through 6mm Durasteel | 68 metres | 270 metres | 1.5 per metre |
| VJT T118AHM Jigsaw Blade Cutting through 9.5mm Durasteel | 77 metres | 300 metres | 1.3 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.4 kg | dB(A) | 6.2 m/s ² | 1h 10min | 5h 10min | 1.3 |





Used with a Hilti WSJ 750-ET



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT T101B Jigsaw Blade Cutting through 18mm Plywood | 130 metres | 520 metres | 0.8 per metre |
| VJT T101B Jigsaw Blade Cutting through 18mm Chipboard | 200 metres | 810 metres | 0.49 per metre |
| VJT T344D Jigsaw Blade Cutting through 50x100mm (2"x4") timber | 500 cuts | 1900 cuts | 0.21 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 87 dB(A) | 10.5 m/s ² | 0h 27min | 1h 40min | |





Used with a Hilti WSJ 850-ET



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT T101B Jigsaw Blade Cutting through 4mm Polycarbonate sheet | 600 metres | 2400 metres | 0.17 per metre |
| VJT T101B Jigsaw Blade Cutting through 12mm MDF | 590 metres | 2300 metres | 0.17 per metre |
| VJT T344D Jigsaw Blade Cutting through 50x100mm (2"x4") timber | 1100 cuts | 4400 cuts | 0.09 per cut |
| VJT T141HM Jigsaw Blade Cutting through 55mm Thermalcheck Board | 580 metres | 2300 metres | 0.18 per metre |
| VJT T141HM Jigsaw Blade Cutting through 12.5mm Plasterboard | 740 metres | 2900 metres | 0.14 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 87 dB(A) | 8.2 m/s ² | 0h 44min | 2h 50min | 2.3 |





Jigsaw Blades

Used with a Makita 4350FCT



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|----------------|
| VJT T101B Jigsaw Blade Cutting through 18mm Hardwood Ply | 360 metres | 1400 metres | 0.28 per metre |
| VJT T144DF Jigsaw Blade Cutting through 18mm Hardwood Ply | 320 metres | 1200 metres | 0.31 per metre |
| VJT T301CDF Jigsaw Blade Cutting through 18mm Hardwood Ply | 360 metres | 1400 metres | 0.28 per metre |
| VJT T301CDF Jigsaw Blade* Cutting through 18mm Hardwood Ply | 110 metres | 440 metres | 0.9 per metre |
| VJT T101B Jigsaw Blade Cutting through 18mm Sterling Board | 560 metres | 2200 metres | 0.18 per metre |
| VJT T101B Jigsaw Blade Cutting through 18mm Sterling Board | 220 metres | 870 metres | 0.46 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.4 kg | 84 dB(A) | 9.7 m/s ² | 0h 31min | 2h 00min | 3.2 |





Sabre Saw Blades

Used with a Hilti WSR 1400-PE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT S922HF Sabre Saw Blade Cutting through 18mm Plywood | 39 metres | 150 metres | 2.6 metres |
| VJT S922HF Sabre Saw Blade Cutting through 50x100mm (2"x4") timber | 50 cuts | 200 cuts | 2 per cut |
| VJT S2345X Sabre Saw Blade Cutting through 18mm Chipboard | 85 metres | 340 metres | 1.2 per metre |
| VJT S918B Sabre Saw Blade Cutting through Steel scaffold tube | 37 cuts | 140 cuts | 2.8 per cut |
| VJT S918B Sabre Saw Blade Cutting through Steel pipe (OD 33mm) | 77 cuts | 300 cuts | 1.3 per cut |
| VJT S918B Sabre Saw Blade Cutting through 80x60x3mm Steel U Channel | 31 cuts | 120 cuts | 3.3 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.5 kg | 89 dB(A) | 15.1 m/s ² | 0h 13min | 0h 52min | 7.6 |





Sabre Saw Blades

Used with a Makita JR3050T



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-------------|
| VJT S918B Sabre Saw Blade Cutting through 50x50x3mm Steel angle | 11 cuts | 44 cuts | 9.1 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|------------|-----------------------|---------------------|---------------------|----------------|
| Weigh | t Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 3.2 kg | 88 dB(A) | 24.7 m/s ² | 0h 04min | 0h 19min | 21 |





Sabre Saw Blades

Used with a Makita JR3070CT-AVT



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-------------|
| VJT S918B Sabre Saw Blade Cutting through 50x50x3mm Steel | 130 cuts | 520 cuts | 0.8 per cut |
| angle | 130 0013 | 320 Cuts | o.o per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.2 kg | 88 dB(A) | 9.3 m/s ² | 0h 34min | 2h 10min | 2.9 |





Used with a Evolution EVO180



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 180x20mm Z36 TCT Blade Cutting through 50x50x6mm Steel angle | 5300 cuts | 21000 cuts | 0.019 per cut |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 7 kg | 99 dB(A) | 2 m/s ² | > 8h | > 8h | 0.14 |





Used with a Hilti WSC 255-KE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT 160x20mm Z24 TCT Blade Cutting through 18mm Hardwood ply | 2400 metres | 9800 metres | 0.041 per metre |
| VJT 160x20mm Z24 TCT Blade Cutting through 50mm (2") timber | 1600 metres | 6500 metres | 0.07 per metre |
| VJT 160x20mm Z48 TCT Blade Cutting through 18mm Sterling Board | 3000 metres | 12000 metres | 0.033 per metre |
| VJT 160x20mm Z48 TCT Blade Cutting through 12.5mm Plasterboard | 6700 metres | 27000 metres | 0.015 per metre |
| VJT 160x20mm Z48 TCT Blade Cutting through 18mm Hardwood ply | 2600 metres | 10000 metres | 0.038 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.3 kg | 89 dB(A) | 2.9 m/s ² | 6h 00min | > 8h | 0.28 |





Used with a Hilti WSC 265-KE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT 180x20mm Z12 TCT Blade Cutting through 50mm (2") timber | 930 metres | 3700 metres | 0.11 per metre |
| VJT 180x20mm Z12 TCT Blade Cutting through 12mm MDF | 3300 metres | 13000 metres | 0.03 per metre |
| VJT 180x20mm Z24 TCT Blade Cutting through 50mm (2") timber | 1000 metres | 4200 metres | 0.1 per metre |
| VJT 180x20mm Z24 TCT Blade Cutting through 12mm MDF | 4200 metres | 17000 metres | 0.024 per metre |
| VJT 180x20mm Z56 TCT Blade Cutting through 50mm (2") timber | 850 metres | 3400 metres | 0.12 per metre |
| VJT 180x20mm Z56 TCT Blade Cutting through 12mm MDF | 3700 metres | 15000 metres | 0.027 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 4.5 kg | 89 dB(A) | 3.3 m/s ² | 4h 30min | > 8h | 0.37 |





Used with a Hilti WSC85



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT 230x30mm Z18 TCT Cutting through 50x100mm (2"x4") timber | 2000 metres | 8000 metres | 0.05 per metre |
| VJT 230x30mm Z18 TCT Cutting through 18mm Hardwood Ply | 6100 metres | 24000 metres | 0.017 per metre |
| VJT 230x30mm Z24 TCT Cutting through Softwood | 1500 metres | 6100 metres | 0.07 per metre |
| VJT 230x30mm Z24 TCT Cutting through 12mm MDF | 4300 metres | 17000 metres | 0.024 per metre |
| VJT 230x30mm Z24 TCT Cutting through 12.5mm Plasterboard | 8700 metres | 35000 metres | 0.012 per metre |
| VJT 230x30mm Z24 TCT Cutting through 18mm Hardwood Ply | 4400 metres | 17000 metres | 0.023 per metre |
| VJT 230x30mm Z40 TCT Cutting through 18mm Hardwood Ply | 3800 metres | 15000 metres | 0.027 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|-----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 7 kg | 100 dB(A) | 2.5 m/s ² | 7h 50min | > 8h | 0.22 |





Used with a Makita 5903R



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT 230x30mm Z24 TCT Cutting through 18mm Hardwood Ply | 4900 metres | 19000 metres | 0.021 per metre |
| VJT 230x30mm Z24 TCT Cutting through 18mm Sterling Board | 5200 metres | 21000 metres | 0.019 per metre |
| VJT 230x30mm Z40 TCT Cutting through 18mm Hardwood Ply | 3600 metres | 14000 metres | 0.028 per metre |
| VJT 230x30mm Z40 TCT Cutting through 18mm Sterling Board | 4400 metres | 17000 metres | 0.023 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 7 kg | 95 dB(A) | 2.6 m/s ² | 7h 20min | > 8h | 0.23 |





Used with a Makita LC1230



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 300x30mm Z60 TCT Cutting through 50x50x6mm Steel angle | 920 metres | 3600 metres | 0.11 per metre |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 19 kg | dB(A) | 6.8 m/s ² | 1h 00min | 4h 20min | 1.6 |





Used with a Bosch GSB 20-2



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|---------------|
| VJT 7mm HSS Drill Bit Drilling through 3mm Mild Steel | 1000 holes | 4000 holes | 0.1 per hole |
| VJT 10mm HSS Drill Bit Drilling through 3mm Mild Steel | 210 holes | 860 holes | 0.47 per hole |
| VJT 13mm HSS Drill Bit Drilling through 3mm Mild Steel | 43 holes | 170 holes | 2.4 per hole |
| VJT 7mm HSS Drill Bit Drilling through 6mm Mild Steel | 840 holes | 3300 holes | 0.12 per hole |
| VJT 10mm HSS Drill Bit Drilling through 6mm Mild Steel | 180 holes | 730 holes | 0.6 per hole |
| VJT 13mm HSS Drill Bit Drilling through 6mm Mild Steel | 49 holes | 190 holes | 2.1 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.5 kg | 99 dB(A) | 19.7 m/s ² | 0h 07min | 0h 31min | 13 |





Used with a Hilti SF151-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|-----------------------------------|--------------|-------------|----------------|
| VJT 8mm Brad Point Drill Bit | | | |
| Drilling through 50mm (2") timber | 7100 | 28000 | 0.015 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.5 kg | 77 dB(A) | 4.8 m/s ² | 2h 10min | > 8h | 0.8 |





Used with a Hilti SF180-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-----------------|
| VJT 2mm HSS Drill Bit Drilling through 6mm Mild Steel | 910 | 3600 | 0.11 per hole |
| VJT 8x3mm Twinhead Woodscrew Wood to wood fastening timber | 2300 screws | 9200 screws | 0.044 per screw |
| VJT 5mm Hammer Drill Bit Drilling 100mm depth 7N/mm ² Thermalite Block | 430 holes | 1700 holes | 0.24 per hole |
| VJT 5mm Hammer Drill Bit Drilling through Common Brick | 76 holes | 300 holes | 1.4 per hole |
| VJT 6mm Brad Point Drill Bit Drilling through 18mm Plywood | 15000 holes | 60000 holes | 0.007 per hole |
| VJT 6mm Brad Point Drill Bit Drilling through 50mm (2") timber | 8800 holes | 35000 holes | 0.012 per hole |
| VJT 8mm Brad Point Drill Bit Drilling through 18mm Plywood | 8300 holes | 33000 holes | 0.012 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.7 kg | 89 dB(A) | 3.6 m/s ² | 3h 40min | > 8h | 0.45 |





Used with a Hilti SF180-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 8mm Brad Point Drill Bit Drilling through 70mm Softwood | 4200 holes | 17000 holes | 0.024 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.7 kg | 89 dB(A) | 3.6 m/s ² | 3h 40min | > 8h | 0.45 |





Used with a Hilti SR16



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 2mm HSS Drill Bit Drilling through 6mm Mild Steel | 2600 | 10000 | 0.038 per hole |
| VJT 5mm HSS Drill Bit Drilling through 6mm Mild Steel | 850 | 3400 | 0.12 per hole |
| VJT 13mm HSS Drill Bit Drilling through 10mm Mild Steel with pilot | 29 | 110 | 3.4 per hole |

| To: | | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|-----|----|----------|-----------------------|---------------------|---------------------|----------------|
| Wei | | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2 k | (g | 86 dB(A) | 16.5 m/s ² | 0h 11min | 0h 44min | 9.1 |





Used with a Hilti UH240-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|----------------|
| VJT 12mm Brad Point Drill Bit Drilling through 50mm (2") timber | 4400 holes | 17000 holes | 0.023 per hole |
| VJT 13mm HSS Drill Bit Drilling through 3mm Aluminium | 850 holes | 3400 holes | 0.12 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 3.8 kg | 93 dB(A) | 6.6 m/s ² | 1h 00min | 4h 30min | 1.5 |





Used with a Hitachi D10VF



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|--------------|
| VJT 7mm HSS Drill Bit Drilling through 3mm Mild Steel | 200 holes | 810 holes | 0.5 per hole |
| VJT 10mm HSS Drill Bit Drilling through 3mm Mild Steel | 57 holes | 220 holes | 1.8 per hole |
| VJT 7mm HSS Drill Bit Drilling through 6mm Mild Steel | 150 holes | 600 holes | 0.7 per hole |
| VJT 10mm HSS Drill Bit Drilling through 6mm Mild Steel | 88 holes | 350 holes | 1.2 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.8 kg | dB(A) | 14.1 m/s ² | 0h 15min | 1h 00min | 6.7 |





Used with a Makita DHP456



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|---------------|---------------|-------------------|
| VJT 6mm Hammer Drill Bit Drilling 50 mm depth 7N/mm² Concrete Block | 275 holes | 1105 holes | 0.36 per hole |
| VJT 10x2" Twinfast Woodscrew Wood to wood fastening | 10320 screws | 41295 screws | 0.0095 per screw |
| FFS 7.5x72 Masonry Screw Fixing 45mm Timber to 40N/mm² Concrete | 10855 fixings | 43435 fixings | 0.0092 per fixing |
| VJT 12mm Brad Point Drill Bit Through drilling 45mm Timber | 1745 holes | 6980 holes | 0.06 per hole |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.8 kg | 81 dB(A) | 13.5 m/s ² | 0h 16min | 1h 05min | 6.09 |





Used with a Makita HP2070



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|-------------|---------------|
| VJT 7mm HSS Drill Bit Through drilling 2mm Mild Steel | 1080 holes | 4325 holes | 0.09 per hole |
| VJT 10mm HSS Drill Bit Through drilling 2mm Mild Steel | 235 holes | 945 holes | 0.42 per hole |
| VJT 7mm HSS Drill Bit Through drilling 4mm Mild Steel | 490 holes | 1960 holes | 0.20 per hole |
| VJT 10mm HSS Drill Bit Through drilling 4mm Mild Steel | 150 holes | 605 holes | 0.66 per hole |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|---------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.6 kg | 99 dB(A) | 16 m/s ² | 0h 11min | 0h 46min | 8.5 |





Used with a Makita TD0101F



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| 7.5x72mm masonry screw Fixing 50mm (2") timber to 40N/mm ² Concrete | 970 fixings | 3800 fixings | 0.11 per fixing |
| VJT 10x2" Twinfast Woodscrew Wood to wood fastening | 1300 screws | 5300 screws | 0.08 per screw |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|---------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 0.99 kg | 90 dB(A) | 8.5 m/s ² | 0h 41min | 2h 40min | 2.4 |





Impact Drive Fixings

Used with a Hilti SIW144-A



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|------------------|
| VJT Screwbolt 6x60 Fixing to 40N/mm ² Concrete 15mm fixture | 100 fixings | 420 fixings | 1 per fixing |
| VJT Screwbolt 6x60 Removal from 40N/mm² Concrete 15mm fixture | 2300 fixings | 9400 fixings | 0.043 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.6 kg | 93 dB(A) | 12.2 m/s ² | 0h 20min | 1h 20min | 5 |





Impact Drive Fixings

Used with a Makita BTW251



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT Screwbolt 12x100mm Fixing to 40N/mm ² Concrete 15mm fixture | 130 fixings | 510 fixings | 0.8 per fixing |
| VJT Screwbolt 12x100mm Removal from 40N/mm² Concrete 15mm fixture | 600 fixings | 2400 fixings | 0.17 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|-----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.7 kg | 00 -ID(A) | 13.7 m/s ² | 0h 15min | 1h 00min | 6.3 |





Impact Drive Fixings

Used with a Makita TW0350



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-----------------|
| VJT Screwbolt 16x100mm | | | |
| Fixing to 40N/mm ² Concrete 15mm fixture | 210 fixings | 840 fixings | 0.48 per fixing |

| Tool | Sound | EN 60745 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib. Level | Daily Action Value | Daily Limit Value | Minute |
| 2.9 kg | 93 dB(A) | 11.5 m/s ² | 0h 22min | 1h 30min | 4.5 |





Drywall Screws

Used with a Bosch GSR 6-25 TE



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|---------------|---------------|------------------|
| VJT Drywall Screw BZP 3.5x32mm Fixing Plasterboard to timber | 12000 fixings | 49000 fixings | 0.009 per fixing |
| VJT Drywall Screw BZP 3.5x32mm Fixing Plasterboard to 0.5mm metal stud | 7900 fixings | 31000 fixings | 0.013 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.5 kg | 85 dB(A) | 2 m/s ² | > 8h | > 8h | 0.14 |





Used with a Makita 6825R



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|---------------|------------------|
| VJT Drywall Screw BZP 3.5x32mm Fixing Plasterboard to timber | 9100 fixings | 36000 fixings | 0.011 per fixing |
| VJT Drywall Screw BZP 3.5x32mm Fixing Plasterboard to 0.5mm metal stud | 5000 fixings | 20000 fixings | 0.02 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.5 kg | 85 dB(A) | 2 m/s ² | > 8h | > 8h | 0.14 |





Used with a Makita 6844



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|--------------|--------------|-----------------|
| VJT Drywall Screw BZP 3.5x42mm Fixing Plasterboard to timber | 10000 screws | 43000 screws | 0.01 per screw |
| VJT Drywall Screw BZP 3.5x42mm Fixing Plasterboard to 0.5mm metal stud | 11000 screws | 47000 screws | 0.009 per screw |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|--------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.1 kg | dB(A) | 3 m/s ² | 5h 30min | > 8h | 0.3 |





Used with a Spit 216



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|---------------|---------------|------------------|
| VJT Drywall screw BZP 3.5x32mm Fixing Plasterboard to timber | 13000 fixings | 54000 fixings | 0.008 per fixing |
| VJT Drywall screw BZP 3.5x32mm Fixing Plasterboard to 0.5mm metal stud | 9400 fixings | 37000 fixings | 0.011 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.1 kg | 77 dB(A) | 1.8 m/s ² | > 8h | > 8h | 0.11 |





Drywall Screws

Used with a Spit 216 Hdi



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|--|---------------|---------------|-------------------|
| VJT Drywall screw BZP 3.5x32mm Fixing Plasterboard to timber | 22000 fixings | 91000 fixings | 0.0044 per fixing |
| VJT Drywall screw BZP 3.5x32mm Fixing Plasterboard to 0.5mm metal stud | 17000 fixings | 68000 fixings | 0.006 per fixing |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 1.8 kg | 77 dB(A) | 1.5 m/s ² | > 8h | > 8h | 0.08 |



Sanding Sheets

Used with a Hilti WFO 280



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---------------------------------------|--------------|-------------|-------------|
| VJT 93x280mm P60 Sheet Sanding Timber | 2hrs 00mins | >8 hrs | 0.9 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.8 kg | 83 dB(A) | 4.9 m/s ² | 2h 00min | > 8h | 0.9 |





Sanding Sheets

Used with a Hilti WSC 450-E



Productivity examples

| Application | Action Value | Limit Value | HSE Points |
|---|--------------|-------------|-------------|
| VJT 150mm P60 Sheet Sanding timber | 28 mins | 1hr 50mins | 3.5 per min |
| VJT 150mm P60 Sheet Sanding Hardwood Ply | 34 mins | 2hrs 10mins | 3 per min |
| VJT 150mm P120 Sheet Sanding Timber | 46 mins | 3hrs 00mins | 2.2 per min |

| Tool | Sound | ISO 5349 | Trigger Time to the | Trigger Time to the | HSE Points per |
|--------|----------|-----------------------|---------------------|---------------------|----------------|
| Weight | Pressure | Vib.Level | Daily Action Value | Daily Limit Value | Minute |
| 2.1 kg | 82 dB(A) | 10.2 m/s ² | 0h 28min | 1h 50min | 3.5 |









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