IEC61029_1A - ATTACHMENT				
Clause	Requirement + Test		Result - Remark	Verdict

ATTACHMENT TO TEST REPORT IEC61029_1A EUROPEAN GROUP DIFFERENCES AND NATIONAL DIFFERENCES

Safety of transportable motor-operated electric tools - Part 1: General requirements

Differences according to..... EN 61029-1:2009 + A11:2010

Attachment Form No...... EU_GD_IEC61029_1A_II

Attachment Originator DEKRA Testing and Certification GmbH

Master Attachment Date (2011-04)

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	CENELEC COMMON MODIFICATIONS (EN)			
7	MARKING			
	Business name and address of the manufacturer and, where applicable, his authorised representative. Any address shall be sufficient to ensure contact	AGP No.2, Kejia Rd., Douliu City, Yunlin County 64057, Taiwan	_	
	Designation of the tool:	HOLE CUTTING DRILL	_	
	Designation of series or type:	HC127	_	
	Year of manufacture	2012	_	
	Tool for star-delta connection clearly marked with the two voltages		N/A	
	Rated input or current is the total maximum that can be on the circuit at the same time		N/A	
	In case of alternative components, the rated input is corresponding to the highest load		N/A	
	Additional markings (e.g. motor markings) are allowed, provided that they do not give rise to misunderstanding	CE marking and WEEE symbol	Р	
7.3	Heating elements: marking according to EN60335-		N/A	
7.4	If the tool can be adjusted to suit different rated voltages or different rated inputs, the voltage or input to which the tool is adjusted is easily and clearly discernible.		N/A	
	This requirement does not apply to tools for star- delta connection.		N/A	

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	For tools where frequent changes in voltage setting are not required, this requirement is deemed to be met if the rated voltage or the rated input to which the tool is adjusted, can be determined from a wiring diagram fixed to the tool; the wiring diagram may be on the inside of a cover which has to be removed to connect the supply conductors. This diagram may be on a card which is riveted to the cover or on a paper or similar label secured to the cover by an adhesive but it shall not be on a label loosely attached to the tool.		N/A
7.13	The words 'Original instructions' must appear on the language version(s) verified by the manufacturer or his authorised representative.	English version only	Р
	Where no 'Original instructions' exist in the official language(s) of the country where the tool is to be used, a translation into that/those language(s) must be provided by the manufacturer or his authorised representative or by the person bringing the tool into the language area in question		N/A
	The translations must be bearing the words "Translation of the original instructions", and they must be accompanied by a copy of the "Original instructions".		N/A
	- Instructions		
	a) Installation instructions:		Р
	- Setting-up or fixing tool in a stable position.		Р
	- Information about disassembly and reassembly if applicable for transportation and/or use.		Р
	b) Operating instructions:		Р
	- Limits on size of work piece and type of material.		Р
	- Indication of the correct operator's position.		Р
	- Instruction on how to handle jammed accessories.		Р
	- Information about lifting handles/similar, and instruction to use them for transportation.		Р
	c) Safety precautions:		Р
	- Precautions and use of PPE.		Р
	- General safety instructions.		Р
	These shall consist of the following text: "WARNING! When using electric tools basic safety precautions should always be followed to		
	reduce the risk of fire, electric shock and personal injury including the following.		
	Read all these instructions before attempting to operate this product and save these instructions".		

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	d) Maintenance and servicing:	Р
	- Regular cleaning, maintenance and lubrication. (Including the warning "Remove the plug before carrying out any adjustment, servicing or maintenance").	Р
	- Instruction, how to safely remove blockages of dust, chips or workpiece fragments.	Р
	e) Safe operation:	Р
	Keep work area clear - Cluttered areas and benches invite injuries.	Р
	Consider work area environment - Do not expose tools to rain. - Do not use tools in damp or wet locations. - Keep work area well lit. - Do not use tools in the presence of flammable liquids or gases.	Р
	Guard against electric shock - Avoid body contact with earthed or grounded surfaces (e.g. pipes, radiators, ranges, refrigerators).	Р
	Keep other persons away - Do not let persons, especially children, not involved in the work touch the tool or the extension cord and keep them away from the work area.	Р
	Store idle tools - When not in use, tools should be stored in a dry locked-up place, out of reach of children.	Р
	Do not force the tool - It will do the job better and safer at the rate for which it was intended.	Р
	Use the right tool - Do not force small tools to do the job of a heavy duty tool. - Do not use tools for purposes not intended; for example do not use circular saws to cut tree limbs or logs.	Р
	Dress properly - Do not wear loose clothing or jewellery, they can be caught in moving parts. - Non-skid footwear is recommended when working outdoors. - Wear protective hair covering to contain long hair.	Р

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	Use protective equipment		Р
	- Use safety glasses.		
	 Use face or dust mask if working operations create dust. 		
	Connect dust extraction equipment		N/A
	 If the tool is provided for the connection of dust extraction and collecting equipment, ensure these are connected and properly used. 		
	Do not abuse the cord		Р
	- Never yank the cord to disconnect it from the		'
	socket. Keep the cord away from heat, oil and sharp edges.		
	Secure work		Р
	 Where possible use clamps or a vice to hold the work. It is safer than using your hand. 		
	Do not overreach		Р
	- Keep proper footing and balance at all times.		
	Maintain tools with care		Р
	 Keep cutting tools sharp and clean for better and safer performance. 		
	- Follow instruction for lubricating and changing		
	accessories.		
	 Inspect tool cords periodically and if damaged have them repaired by an authorized service facility. 		
	 Inspect extension cords periodically and replace if damaged. 		
	 Keep handles dry, clean and free from oil and grease. 		
	Disconnect tools		Р
	 When not in use, before servicing and when changing accessories such as blades, bits and cutters, disconnect tools from the power supply. 		
	Remove adjusting keys and wrenches		Р
	 Form the habit of checking to see that keys and adjusting wrenches are removed from the tool before turning it on. 		
	Avoid unintentional starting - Ensure switch is in "off" position when plugging in.		Р
	Use outdoor extension leads		Р
	All distributions		'

- When the tool is used outdoors, use only

marked.

Stay alert

extension cords intended for outdoor use and so

- Watch what you are doing, use common sense and do not operate the tool when you are tired.

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	Check damaged parts		Р
	- Before further use of tool, it should be carefully checked to determine that it will operate		
	properly and perform its intended function.		
	- Check for alignment of moving parts, binding of		
	moving parts, breakage of parts, mounting and any other conditions that may affect its operation.		
	 A guard or other part that is damaged should be properly repaired or replaced by an authorized service centre unless otherwise indicated in this instruction manual. 		
	 Have defective switches replaced by an authorized service centre. 		
	- Do not use the tool if the switch does not turn it on and off.		
	Warning		Р
	- The use of any accessory or attachment other than one recommended in this instruction		
	manual may present a risk of personal injury.		
	Have your tool repaired by a qualified person		Р
	 This electric tool complies with the relevant safety rules. Repairs should only be carried out by qualified persons using original spare parts, otherwise this may result in considerable danger to the user. 		
Za)	Emissions		P
Za)			•
	1 The noise emission according to 13.2.		Р
	2 Recommendation for the operator to wear hearing protection.		Р
	3 The vibration emission according to 13.3.		Р
	Vibration emission < 2.5 m/s², stated in the instruction		Р
	Vibration emission > 2.5 m/s² value given in the instruction		N/A
	4 The following information:		Р
	- that the declared vibration total value has been		Р
	measured in accordance with a standard test method and may be used for comparing one tool with another.		
	 that the declared vibration total value may also be used in a preliminary assessment of exposure. 		Р
	5 A warning:		Р
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	that the vibration emission during actual use of the power tool can differ from the declared total value depending on the ways in which the tool is used; and		P
	- of the need to identify safety measures to protect the operator that are based on an estimation of exposure in the actual conditions of use (taking account of all parts of the operating cycle such as the times when the tool is switched off and when it is running idle in addition to the trigger time).		Р
Zb)	Connection to water supply		N/A
	1 For tools intended to be connected to a water supply, instructions for the connection to the water supply, the use of the water and the use of attachments to comply with 14.5 in order to avoid affection of the tool by water, the inspection of hoses and other critical parts which could deteriorate and the maximum permitted pressure of the water supply.		N/A
	2 For tools intended to be connected to a water supply, the substance of the following Instructions, if applicable:		N/A
	 for tools provided with a PRCD: Never use the tool without the PRCD delivered with the tool, 		N/A
	for tools provided with an isolating transformer: Never use the tool without the transformer delivered with the tool or of the type as specified in these instructions,		N/A
	 Replacement of the plug or the supply cord shall always be carried out by the manufacturer of the tool or his service organisation, 		N/A
	 Keep water clear off the electrical parts of the tool and away from persons in the working area. 		N/A
	Following information is also given:		Р
	- Business name and address of the manufacturer and, where applicable, his authorised representative. Any address is sufficient to ensure contact.		Р
	- Designation of the tool and series or type as required by 7.1, including description of machine such as "bench grinder", "band saw" etc.	HOLE CUTTING DRILL	Р
	- A repeat of the safety markings (e.g. maximum speed, capacity, etc.) that are to be marked on the tool;		Р

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	An explanation of any symbols or pictograms marked on the tool;		Р
	- The mass of the tool including detachable parts.	Max. 16,5 kg	Р
12	LEAKAGE CURRENT	1	
	Tools with heating element tested according to EN 60335-1; 13.2		N/A
13	ENVIRONMENTAL REQUIREMENTS		
13.1	Dust measurements:		N/A
	If the manufacturer gives information on the dust collection efficiency refer to Annex ZD		N/A
13.2	Noise:		
	Test according to sub clauses 13.2.1 – 13.2.6		Р
	Noise measurements :	See Report (3121670.50A)	Р
13.2.7	Declaration and verification of noise emission values		Р
	L_{pA} [dB(A)]	94 3	Р
	L_{WA} [dB(A)]	107 3	Р
	L_{pCpeak} (dB)		N/A
13.3	Vibration:		
	Test according to sub clauses 13.3.1 – 13.3.6		Р
	Vibration measurements		Р
13.3.7.1	Reported vibration value		Р
	Work mode - vibration emission value a (m/s²):	0,7	Р
	Uncertainty K (m/s²):	1,5	Р
13.3.7.2	Declaration of the vibration emission value (instruction manual)		Р
	Work mode - vibration emission value a (m/s²):	0,7	Р
	Uncertainty K (m/s²)	1,5	Р
14	MOISTURE RESISTANCE		
14.2	Tools with a higher degree than IPX0 comply with EN 60529 under working condition IP		N/A
14.3	Insulation resistance after humidity treatment		Р
14.5	Tools, except those of class III, intended to be connected to a water supply shall be constructed so that the electrical insulation of the tool is not affected by water during recommended operation.		N/A

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	Compliance is checked by the following test.	N/A
	The tool is connected to a water supply and operated at 1,06 times rated voltage for 5 min in the most unfavourable position in accordance with the manufacturer's instructions.	N/A
	Throughout the test the leakage current between live parts and the enclosure as specified in 12.2 is monitored. The leakage current shall not exceed the value specified in 12.2.	N/A
	Immediately after this treatment inspection shall show that water has not entered the tool to any appreciable extent and that there is no trace of water on insulation for which creepage distances are specified in 27.1.	N/A
16	ENDURANCE	P
16.1	Operation of overload protection devices	N/A
17	ABNORMAL OPERATION	
17.2	If the tool incorporates a device for limiting speed and should the electronic control device fail to operate, the tool is considered to have withstood the test when the said speed limiting device operates during the test.	N/A
18	MECHANICAL HAZARDS	
18.1	All working elements, including adjustable features or attachments intended as part of the tool shall be secured so that they cannot create dangers during normal use by moving, or being released, out of the normal working constraints of the tool.	P
	It shall not be possible to touch dangerous moving parts through dust collection openings after removing any detachable parts of the dust collection system.	Р
A11	Addition: For fixed guards to be removed, fastenings remain attached to the guard or to the tool.	N/A
18.3	Tools provided with wheels shall have adequate stability during transportation.	N/A
20	CONSTRUCTION	
20.8	Asbestos not used under any circumstances	Р
20.21	Tool provided with integral dust collection device, or	N/A
	external dust collection device	N/A
	If not practicable dust not thrown in the direction of the user	Р

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20.22	Tools intended to be connected to a water supply shall either	N/A
	- be of class III, or	N/A
	- be of class II or of class I for use in combination with an isolating transformer, or	N/A
	 be of class II or of class I and provided with a PRCD. The PRCD shall have a sensitivity of 10 mA or less. The PRCD shall not be provided with a switch contact for the protective conductor, which opens, when the PRCD trips due to a residual current. The PRCD may be incorporated either in the tool, or 	N/A
	- in the cord, or	N/A
	- in the plug, or	N/A
	- in a separate control box with one or more socket outlets in accordance with EN 60309-2 with the earthing contact position 1 h.	N/A
	PRCDs incorporated in the cord, in the plug or in a separate control box shall have a degree of protection against the ingress of water of at least IPX4.	N/A
21	INTERNAL WIRING	
21.1	In case of doubt with regard to the insulation, an electric strength test shall be carried out between the conductor and metal foil wrapped around the conductor insulation, a test voltage of 2000 V being applied for 15 min.	Р
21.4	Insulating sleeves may be used to prevent such contact, provided that the sleeves withstand the tests specified for supplementary insulation and that the conductors or sleeves are not likely to be mislaid or lost during routine servicing and repair.	N/A
22	COMPONENTS	
22.1	Components shall comply with the safety requirements specified in the relevant CENELEC standards as far as they reasonably apply.	Р
22.2	Mains switches marked with individual ratings tested in accordance with EN 61058-1	Р
22.5	Plugs and appliance inlets for safety extra-low voltage circuits or for frequencies other than 50 Hz of 60 Hz not interchangeable with plugs, connectors and appliance inlet complying with IEC 60083 or EN 60320-1.	N/A
22.9	Appliance couplers shall comply with EN 60320-1.	N/A

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SUPPLY CONNETION AND EXTERNAL FLEXIBLE	CABLES AND CORDS	
 polyvinyl chloride sheathed H05VV-F 	H05VV-F	Р
- rubber sheathed H05RR-F	H07RN-F	Р
Supply cords of tools intended to be connected to a water supply shall not be lighter than ordinary polychloroprene-sheathed flexible cord (code designation H05 RN-F).		N/A
Tools provided with plug complying with IEC 60083, EN 60309-1 and EN 60309-2		Р
TERMINALS FOR EXTERNAL CONDUCTORS		
For the purpose of the requirements for power supply cords		Р
- it is not to be expected that two independent fixings will become loose at the same time;		Р
 conductors connected by soldering are not considered to be adequately fixed, unless they are held in place near to the termination, independently of the solder, but "hooking in" before soldering is, in general, considered to be a suitable means for maintaining the conductors of a power supply cord in position, provided the hole through which the conductor is passed is not unduly large. 		N/A
The terminals of a component (e.g. a switch) built into the tool - on the assumption that they comply with the requirements of this clause - may be used as terminals intended for external conductors.		Р
Switches having connecting leads (pig tails) are allowed if the connection point is within the handle or housing and the cord anchorage of the mains supply cable meets the requirements of 23.5.		N/A
ANNEX C		
The explanation concerning safety extra-low voltage is not applicable.		N/A
Addition: An accessible part is not considered to be live if:		N/A
the part is supplied from a safety isolating transformer, provided that		N/A
- for a.c. the peak value of the voltage does not exceed 42,4 V;		N/A
- for d.c. the voltage does not exceed 42,4 V, or		N/A
- the part is separated from live parts by protective impedance.		N/A
	 polyvinyl chloride sheathed H05VV-F rubber sheathed H05RR-F Supply cords of tools intended to be connected to a water supply shall not be lighter than ordinary polychloroprene-sheathed flexible cord (code designation H05 RN-F). Tools provided with plug complying with IEC 60083, EN 60309-1 and EN 60309-2 TERMINALS FOR EXTERNAL CONDUCTORS For the purpose of the requirements for power supply cords it is not to be expected that two independent fixings will become loose at the same time; conductors connected by soldering are not considered to be adequately fixed, unless they are held in place near to the termination, independently of the solder, but "hooking in" before soldering is, in general, considered to be a suitable means for maintaining the conductors of a power supply cord in position, provided the hole through which the conductor is passed is not unduly large. The terminals of a component (e.g. a switch) built into the tool - on the assumption that they comply with the requirements of this clause - may be used as terminals intended for external conductors. Switches having connecting leads (pig tails) are allowed if the connection point is within the handle or housing and the cord anchorage of the mains supply cable meets the requirements of 23.5. ANNEX C The explanation concerning safety extra-low voltage is not applicable. Addition: An accessible part is not considered to be live if: the part is supplied from a safety isolating transformer, provided that for a.c. the peak value of the voltage does not exceed 42,4 V; for d.c. the voltage does not exceed 42,4 V, or the part is separated from live parts by 	rubber sheathed H05RR-F Supply cords of tools intended to be connected to a water supply shall not be lighter than ordinary polychloroprene-sheathed flexible cord (code designation H05 RN-F). Tools provided with plug complying with IEC 60083, EN 60309-1 and EN 60309-2 TERMINALS FOR EXTERNAL CONDUCTORS For the purpose of the requirements for power supply cords - it is not to be expected that two independent fixings will become loose at the same time; - conductors connected by soldering are not considered to be adequately fixed, unless they are held in place near to the termination, independently of the solder, but "hooking in" before soldering is, in general, considered to be a suitable means for maintaining the conductors of a power supply cord in position, provided the hole through which the conductor is passed is not unduly large. The terminals of a component (e.g. a switch) built into the tool - on the assumption that they comply with the requirements of this clause - may be used as terminals intended for external conductors. Switches having connecting leads (pig tails) are allowed if the connection point is within the handle or housing and the cord anchorage of the mains supply cable meets the requirements of 23.5. ANNEX C The explanation concerning safety extra-low voltage is not applicable. Addition: An accessible part is not considered to be live if: - the part is supplied from a safety isolating transformer, provided that - for a.c. the peak value of the voltage does not exceed 42,4 V; - for d.c. the voltage does not exceed 42,4 V, or

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	In the case of protective impedance, the current between the part and the supply source shall not exceed 2 mA for d.c. and its peak value shall not exceed 0,7 mA for a.c., and moreover:		N/A
	- for voltages having a peak value over 42,4 V up to and including 450 V the capacitance shall not exceed 0,1 μ F;		N/A
	 for voltages having a peak value over 450 V up to and including 15 kV the discharge shall not exceed 45 μC. 		N/A
C.17.104	If the safety of the tool for any of the fault conditions specified in C17.103 depends on the operation of a miniature fuse-link complying with EN 60127-3, the test is repeated but with the miniature fuse-link replace by an ammeter.		N/A
	Rated fuse current (A)		N/A
	Measured current (A)		N/A
C. 25.1	Addition: The printed conductors of printed circuit boards shall not be used to provide continuity of the protective earthing circuit.		Р

ZB	ANNEX ZB, SPECIAL NATIONAL CONDITIONS (EN)	N/A
ZC	ANNEX ZC, NATIONAL DEVIATIONS (EN)	N/A
		+
ZD	ANNEX ZD, NATIONAL DEVIATIONS (EN)	N/A