



- 特点
- 脉冲测试高取样率(200MHz)
 - 6kV 可程式脉冲测试
 - 崩溃电压分析
 - 高速测试
 - 单机最大10通道扫描测试(19305-10)
 - 可选配外接高压扫描治具(40ch max.)
 - 繁中/ 简中 / 英文操作介面
 - USB波形储存& 画面撷取功能
 - 图形化彩色显示
 - 标准LAN,USB,RS232介面

Chroma 19305系列为绕线元件脉冲测试器，系列机种包含19305单通道及19305-10 10通道输出测试，最高拥有6kV脉冲电压与200MHz高速取样率提高放电检测能力，10uH感量以上产品测试，拥有波形面积比较、波形面积差比较、波形颤动总量 (Flutter) 及波形二阶微分数 (Laplacian) 等判定方法，可有效检测线圈自体绝缘不良。

绕线元件于生产检测包含电气特性、电气安规耐压进行测试，而线圈之自体绝缘不良通常是造成线圈于使用环境中发生层间短路、跨线短路、出脚短路之根源。其形成原因可能源于初始设计不良、加工制程不良或绝缘材料之劣化等所引起，故加入线圈层间短路测试有其必要性。



Model 19305-10



所谓的『绕线元件脉冲测试』基本上是以『非破坏性』、高速、低能量之电压脉冲施加在待测物上，再藉由分析／比对待测物良品与不良品之等效波形以达到判定良否之目的。绕线元件脉冲测试主要功能乃在早期发现绕线元件中各种潜在之缺陷，例如：层间短路、甚至是不易发觉之部分放电等。

Chroma 19305系列为针对绕线元件测试需求所设计，利用一高压充电之微小电容(测试能量低)与待测线圈形成RLC并连谐振，由谐振之衰减波形，透过高速且精密的取样处理分析技术，可检验出线圈自体之绝缘不良及局部放电，提供变压器、电感等绕线产品进行层间短路测试，让绕线元件生产厂商及使用者在品质验证时，不但拥有可靠的测试品质，能更有效率为产品品质把关。

Chroma 19305-10对于产线上的测试需求提供多通道扫描应用(最大10通道)，单机10通道输出可达成一次多颗扫描测试，节省测试时间及人力成本。

- 四种波形判定模式
- 波形面积比较 (Area Size)
 - 波形面积差比较 (Differential Area)
 - 波形颤动总量 (Flutter Value)
 - 波形二阶微分数 (Laplacian Value)

产品应用
变压器、马达、发电机、汽机车点火线圈、继电器、电磁阀、各式电感及线圈。

- 订购资讯
- 19305：绕线元件脉冲测试器
 - 19305-10：绕线元件脉冲测试器(10ch)
 - A190359：16通道高压扫描治具



A190359：16通道高压扫描治具

规格表		
Model	19305	19305-10
Channel	1ch	10ch
Applied Voltage, Step, and Energy	100V ~ 6000V 10V Step	
Inductance Test Range	More than 10uH	
Sampling Speed	10bit / 5ns (200MHz)	
Sampling Range	11 Range : 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11	
Pulse Number	Pulse Number: 1~32 Dummy Pulse Number: 0~9	
Detection Mode	Area / Differential Area ; Flutter Value / Laplacian Value	
Electrical Hazard Protection		
Key Lock	Yes (password control)	
Interlock	Yes	
Indication, Alarm	GO : Short sound, Green LED ; NG : Long sound, Red LED	
Interface		
	RS232 ,USB , LAN interface	
General		
Operation Environment	Temperature : 0℃ ~ 45℃ Humidity : 15% to 95% R.H@ ≤ 40℃	
Power Consumption	No Load : <150W Rated Load: <1000W	
Power Requirements	100~240Vac, 50 / 60Hz	
Dimension (H xW xD)	177 x 428 x 500 / 16.85 x 6.97 x 19.69 inch	
Weight	26kg / 57.32 lbs	

自动化解决方案
电池测试及
太阳能电测试及
自动化解决方案
半导体测试
解决方案
测试解决方案
光学元件
「E」照明测试
解决方案
测试解决方案
平面显示器
测试解决方案
视频与色彩
测试解决方案
自动光学检测
解决方案
电力电子测试
解决方案
被动元件测试
解决方案
电气安规测试
解决方案
通用及可靠度
测试解决方案
热电阻测试及
温控解决方案
解决方案
量测
解决方案
制造资讯系统
解决方案



特點

- High impulse test sampling rate (200MHz), 10bits
- 6kV impulse voltage test
- Breakdown voltage analysis function
- High speed test
- 10 channels output (19305-10)
- Support max. 40channels scanning test
- Traditional Chinese/Simplified Chinese/English user interface
- USB port for storing waveform & screen capture
- Graphical color display
- Standard LAN, USB and RS232 interfaces

The Chroma 19305 series Impulse Winding Tester included with one channel (19305) and 10 channels output (19305-10), the 19305 series has 6kV impulse voltage and 200MHz high speed sampling rate to improve sensitivity of discharge detection. To test more than 10uH, the built-in Area Size Comparison, Differential Area Comparison, FLUTTER value and LAPLACIAN value functions are able to inspect the coils for poor coil insulation.

The inspection of winding components includes electrical characteristics and safety withstand voltage tests. Commonly poor insulation of coils is the root for causing layer short and output pin short-circuited during usage. The reason could result from bad initial design, poor process or deterioration of insulating materials; therefore, adding the coil layer short test to winding components has its necessity.

The impulse winding test is to impose a non-destructive, high speed and low energy voltage impulse on the DUT (Device Under Test) to analyze/compare the equivalent waveform



Model 19305-10



of yield and defect products for good and no good judgment. The main function of impulse winding test is to discover the potential defects such as layer short, corona or partial discharge that is difficult to find in wound components in early phase.

The Chroma 19305 series is an equipment specifically designed for testing winding components utilizing a high voltage charged micro capacitor (low test energy) and coil under test to form an RLC parallel resonant. Analyzing the oscillation decayed waveform via a high speed and sophisticated sampling process technique can successfully detect the coils with poor insulation. Analyzer can perform impulse tests on wound components like motors, transformers wound products. Not only reliable quality but also efficient product control would be obtained when implementing it to quality verification by wound component test.

The Chroma 19305-10 can providing maximum 10 channels output for multichannel scanning tests to save time and labor costs in the manufacturers.

Four kinds of waveform judgement for testing

- Area Size
- Differential Area
- Flutter Value
- Laplacian Value

Product Application

Transformer, Motor, Generator, Ignition Coil, Relay, Solenoid Valve, Inductance and other coil.

ORDERING INFORMATION

- 19305** : Impulse Winding Tester
- 19305-10** : Impulse Winding Tester (10ch)
- A190359** : 16ch HV External Scanning Box



A190359 : 16ch HV External Scanning Box

SPECIFICATIONS		
Model	19305	19305-10
Channel	1ch	10ch
Applied Voltage, Step, and Energy	500V ~ 6000V 10V Step	
Inductance Test Range	More than 10uH	
Sampling Speed	10bit / 5ns (200MHz)	
Sampling Range	11 Range : 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11	
Pulse Number	Pulse Number: 1~32 Dummy Pulse Number: 0~9	
Detection Mode	Area / Differential Area ; Flutter Value / Laplacian Value	
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