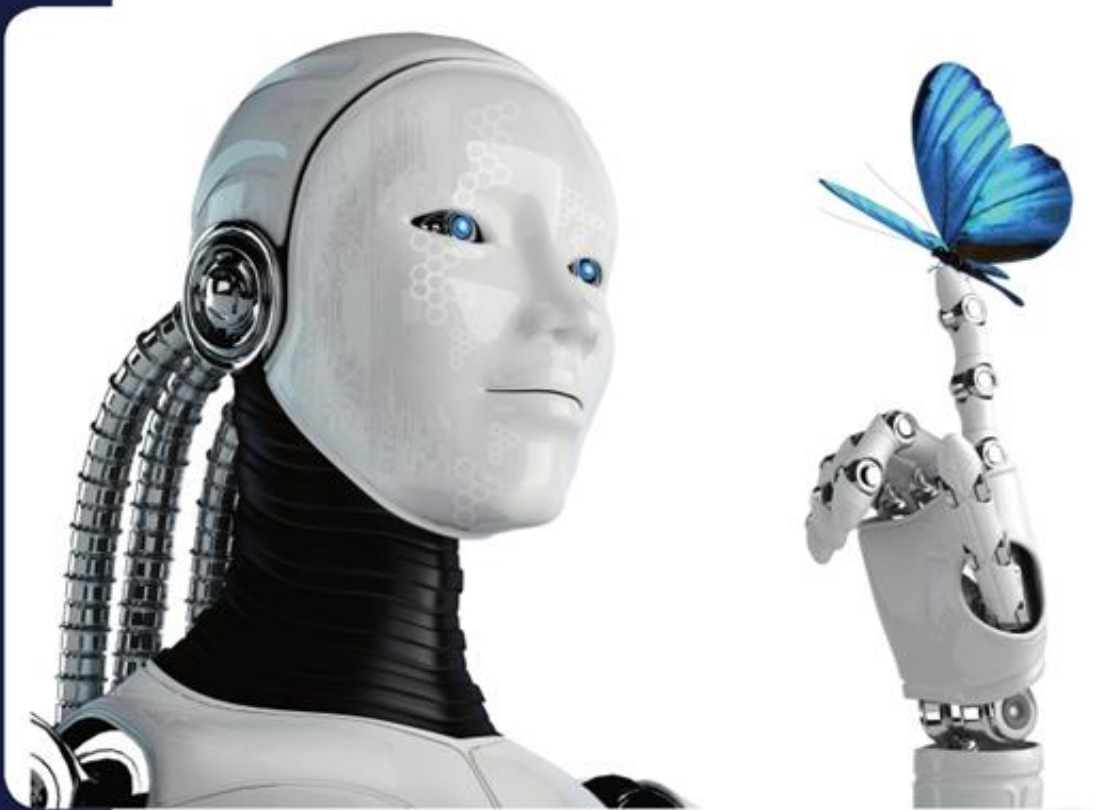


Newsletter February, 2019



ICR



Hot Issue

1. Recognition of authorized laboratory by SAMSUNG
2. Certification Services EU CE Machinery (MD)
3. Guide for the joint use support business of research equipment.
4. ICR Triple Loop Antenna Verification Service support
5. Energy Management System
6. The device under test(DUT) that use main battery of vehicle or USB Power
7. Let's find out about Bluetooth 5.



Recognition of authorized laboratory by SAMSUNG



Certificate No: 2019-02 

Certificate of Qualification

of

ICR

112, Hwanggeum 3-ro 7beon-gil, Yangchon-eup,
Gimpo-Si, Gyeonggi-do, Korea

by

Global CS Center
Samsung Electronics Co., Ltd.

Scope of Authorization

- EMC : HA EMC(Excluding WM), Mobile EMC(Excluding HHP)

This is to certify that above organization was designated as authorized laboratory by SAMSUNG, demonstrates technical competence for a defined scope and the operation of a laboratory quality management system. It shall remain valid for two years from the issued date.

The Chief of Global CS Center
Samsung Electronics Co., Ltd.



31 January 2019
Issued Date

ICR has been recognized as an authorized laboratory by
SAMSUNG on January 31, 2019.

Certification Services

EU CE Machinery (MD)



- **ICR Polska**, the Polish company of ICR, is Certification body by PCA in 2016 and **Notified Body 2703** in 2017. We are working for CE certification service in the world.
- ICR's CE Machinery (MD) certification services provide by ICR engineer in Korea and in the world for industrial machinery and also for machinery listed in ANNEX IV in Machinery directive (2006/42/EC).
- Therefore, we can provide a **certificate** for industrial machinery and **EC-Type Examination** for ANNEX IV machinery.
- **EMC is available by on-site test** without no limitation of space or equipment. Therefore you can get an additional value about time and cost.

Certification Services

EU CE Machinery (MD)



[Lists of ANNEX IV machinery]

1. Presses, including press-brakes, for the cold working of metals, with manual loading and/or unloading, whose movable working parts may have a travel exceeding 6 mm and a speed exceeding 30 mm/s
2. Injection or compression plastics-moulding machinery with manual loading or unloading
3. Injection or compression rubber-moulding machinery with manual loading or unloading
4. Vehicle servicing lifts
5. Devices for the lifting of persons or of persons and goods involving a hazard of falling from a vertical height of more than three meters

Guide for the joint use support business of research equipment.

ICR

연구장비 공동활용 지원사업 안내

※아 이 씨알에서는 당사 고객에 한하여 연구장비 공동활용 지원사업 혜택을 드리고자 연구장비 공동활용 시험기관 (지정기관)으로 등록되었습니다. 아래 내용을 참조하시고 당사 시험시설 사용 시 비용 절감의 혜택을 받으시길 바랍니다.

지원 대상 중소기업기본법 제 2조의 규정에 의한 중소기업	바우처 구매 <ul style="list-style-type: none"> ● 정부지원금(최대 7천만원) 한도 안에서 (정부지원금+기업부담금) 추시 구입 가능 ● 구입일로부터 90 일이 되면 바우처 소멸 ● 바우처 순환을 고려하여 30 ~ 60 일로 조정 가능
지원 기간 2019 년 2 월 1 일 ~ 12 월 31 일까지 (예산 소진 시 까지)	신청 방법 및 문의 온라인 신청 종합관리시스템 Http://www.smttech.go.kr 제출 서류 사업자등록증 사본, 통장 사본, 참여기업 서명서
지원 내용 바우처 (쿠폰)를 통한 ICR 장비 이용료 지원	

구분	정부 지원금	기업 부담금
창업 기업 (연령 7년 이하)	70 % 이내 (최대 3~7천만원)	70 % 이상 (현금)
일반 기업 (연령 7년 초과)	60 % 이내 (최대 3~7천만원)	40 % 이상 (현금)

ICR has been registered as a joint research equipment testing agency (designated institution) to provide benefits to our customers for the joint use support business of research equipment.

We hope you get benefits the cost saving by application when using our testing facilities.

ICR Triple Loop Antenna Verification

Service support



Our measurement service for the LLA antenna for magnetic field emission testing of lighting equipment is available in our ICR.

If you are interested, please contact the following address.

standard

CISPR16-1-4:2012 Ed 3.1

TIME

3~ 4 hour / Up to 1 day

Verification Support brand

Rohde-Schwarz

Narda

Schwarz-Beck

Attachment of TEST Report

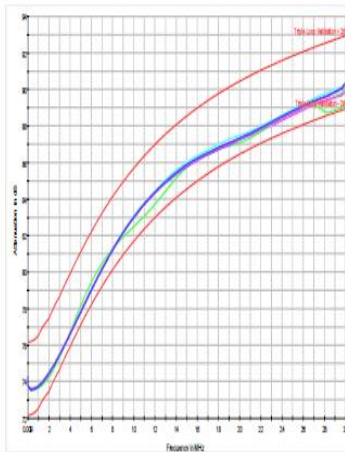
Measurement result

Issuance of test report on measurement result (However, issuance of the KOLAS report requires additional consultation)

manager

Kim Ki-sung section chief / kskim@icrqa.com/ 010-8965-5293

Kim Young Sik director / kys@icrqa.com/010-2224-6751





Energy Management System

- Energy Management System(ISO 50001:2011) is revised and published in August 2018.
- The aim of Energy Management system(EnMS) is to enable organizations to establish the systems and processes necessary to continually improve energy performance, including energy efficiency, energy use and energy consumption.
- By integrating energy management into business practice, organizations can establish a process for continual improvement of energy performance. By improving energy performance and associated energy costs, organizations can be more competitive. In addition, implementation can lead organizations to meet overall climate change mitigation goals by reducing their energy-related greenhouse gas emissions.

Energy Management System



4. Context of organization	6. Planning
4.1 Understanding the organization and its context	6.1 Actions to address risks and opportunities
4.2 Understanding the needs and expectations of interested parties	6.2 Objectives, energy targets and planning to achieve them
4.3 Determining the scope of the energy management system	6.3 Energy review
4.4 Energy management system	6.4 Energy performance indicators
5. Leadership	6.5 Energy baseline
5.1 Leadership and commitment	6.6 Planning for collection of energy data
5.2 Energy policy	
5.3 Organization roles, responsibilities and authorities	

EnMS conforms to a high- level structure, thereby ensuring a high level of compatibility with other management system standards.

Energy Management System



7. Support	9. Performance evaluation
7.1 Resources	9.1 Monitoring, measurement, analysis and evaluation of energy performance and the EnMS
7.2 Competence	9.2 Internal audit
7.3 Awareness	9.3 Management review
7.4 Communication	10. Improvement
8. Operation	10.1 Nonconformity and corrective action
8.1 Operation planning and control	10.2 Continual improvement
8.2 Design	
8.3 Procurement	

EnMS conforms to a high-level structure, thereby ensuring a high level of compatibility with other management system standards.



The device under test(DUT) that use main battery of vehicle or USB power

- The device under test(DUT) that use from main battery of vehicle(DC 12 V or DC 24 V) have to apply KN 41 standard.
- The device under test(DUT) that use from USB power or DC 5 V power have to apply suitable standard.
- However, Even if the DUT use USB power, Can apply KN 41 if declare "Main battery use of vehicle" on the manual.
- In order words, declare "Main battery use of vehicle", apply KN 41 standard even if USB power is used.



Let's find out about Bluetooth 5.

What's new in Bluetooth 5?

Bluetooth 5 adds new features to Bluetooth low energy (BLE)

- Double speed
- Range four times
- Broadcast capacity eight times

High-speed mode

- Bluetooth 5 has twice the data throughput compared to Bluetooth 4.2 using 2Mbps mode. Reduces the frequency of retransmissions and, in some cases, reduces battery power consumption, creating a more robust BLE solution in the 2.4GHz band with high data throughput.
- Exchange data at a faster rate for a better user experience, and implement new features such as data logging and diagnostics.
- Other benefits of high-speed mode are faster over-the-air (OTA) downloading and reduced on-air time to reduce average current consumption.

Long-distance mode

- Long distances can be achieved with new coded physical layer (PHY) rates of 500kbps and 125kbps. Sensitivity to a coded PHY can be improved while maintaining the same TX and RX current consumption. The number of over-the-air (OTA) modulation symbols increases with each bit of data, making it easy for the receiver to distinguish the noise-contrast signal. Increased sensitivity extends the range of Bluetooth low energy from a single room to the entire in-house range.
- There is less need for retransmissions to extend the range of Bluetooth low-energy to create more reliable networks at lower power. Connected homes and buildings can benefit to a much larger extent due to applications such as HVAC, electronic locks, power tools, and system monitoring sensors.

Source: <http://www.ti.com>



www.icrqa.com

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www.icrqa.com

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