Your response

Question	Your response
Do you agree with our proposal to take steps to mitigate risks related to EMF and be in a position to hold licensees, installers and users to account if issues are identified? Please explain the reasons for your response.	Confidential? – No a) The RNLI supports the ICNIRP principals and recommended measures to minimise EMF exposure to the general public from radio transmissions. We agree that Ofcom should hold accountable, licence holders and installers, where ICNIRP safe levels of EMF exposure have been exceeded. However, users, operating under the licence holder's supervision or approval should not themselves be subject to any punitive action, but rather offered appropriate guidance and advice. With the lack of evidence of breaches of the ICNIRP guidelines, (section 4.11 in the consultation document), the RNLI preference would be for a 'light-touch' guidance-regulation from Ofcom, with an emphasis on enhancing awareness of the importance of the safe installation and use of radio transmission equipment, so as to ensure the general public's EMF exposure levels fall within the ICNIRP safe guideline values.
Do you agree with our proposal (a) to include a condition in spectrum authorisations requiring compliance with the basic restrictions for general public exposure identified in the ICNIRP Guidelines; and (b) that this condition should apply to equipment operating at powers greater than 10 Watts?	Confidential? – N a) The RNLI supports the proposal to compel licence holders to comply with the ICNIRP principals and recommended measures to minimise EMF exposure from radio transmissions. b) The RNLI does not agree with the proposal to impose an obligation that every licenced radio installation with equipment of powers >10Watts, must have a measured, tested, calculated and

documented evidence capture of its ICNIRP safe guidelines compliance. For the RNLI, this would impose a new, hugely onerous administrative and technical workload, with dubious benefit delivery. With limited availability of suitably qualified personnel, such an undertaking would be a diversion of resources away from our key operational priority of saving lives at sea.

The typical 25Watt marine-band VHF radio installations at RNLI lifeboat stations and lifeguard beach towers all have adequate spatial distance between antennas and the general public to comfortably ensure safe EMF level exposures, far below ICNIRP guideline limits. Together with the intermittent nature of typical VHF message exchanges, the amount of transmit time over a given period is very small and so EMF exposure levels are far below the ICNIRP guideline limits.

It is important to state that EMF exposure is a value calculated over a specified time period and not just a figure related to a radio transmitter's power level. Hence TX:RX duty cycle and a specified time period, such as the 30 minutes in the ICNIRP guidelines need to be specified. The Ofcom proposal appears to suggest new compliance-demonstrating recording obligations would be imposed, based purely on a radio installation's transmitter power output without any account of transmitting time in a defined measured period of time.

For our volunteer crew alerting, the RNLI operates 100Watt VHF paging transmitters at its UK lifeboat stations and at 3rd party high sites acting as paging message repeater locations. This paging equipment only transmits whenever there is a service or engineering test paging message to be sent. The remainder of the time it just

	sits in standby mode. There is typically no more than around 10 seconds of transmit time in every 24 hour period and so EMF exposure levels are miniscule from these RNLI VHF paging installations. As the RNLI has paging repeater equipment at many 3rd party 'high' sites, we are concerned with how the proposal in section A2.14 could possibly be accomplished in practice at a busy broadcast and cellular mast for example, used by numerous licencees - *'it is the party who makes the last change to a site that is responsible for ensuring that the total EMF emissions from the site continue to comply with the basic restrictions'.* The proposal document does not make mention of transmissions from movable locations, e.g. from radio installations in land vehicles, in boats or in aircraft. The RNLI trains our lifeboat crew and lifeguards in the proper and safe use of two-way radios. Proximity of the general public to RNLI land vehicles and lifeboats with VHF marine-band radio on-board, is controlled. Separation of a minimum 1.3metres distance from vehicle and lifeboat antennas during 25W radio transmissions is usually straight forward to achieve and is a distance compliant with ICNIRP guidelines even with long transmissions. Handheld VHF two-way radios as used by RNLI lifeboat crew and beach lifeguards are 5Watt output devices and so fall outside the proposed scope of the new Ofcom licence condition changes. RNLI All Weather Lifeboats are equipped with MF (1-3MHz) radio equipment. This is available for the crew to use when out at sea beyond the range of Coastguard

	shore VHF masts. There is therefore little possibility of exposure of MF transmission energy from RNLI radio equipment to the general public.
Do you agree with our proposed guidance on EMF compliance and enforcement? Please explain the reasons for your response.	Confidential? – N The RNLI supports the provision by Ofcom of guidance and advice, improving awareness of ICNIRP guidelines to licencees and equipment installers. We urge Ofcom to refine their proposed new licence changes, to direct them only at installations that are likely to be approaching the ICNIRP EMF exposure guideline limits such as at cellular mast infrastructure, adding new generation radio equipment to existing equipment on site. The RNLI believes that a blanket application of new compliance-demonstration recording for all radio installations (with transmissions of >10 W) will impose costly and resource-diverting new obligations on licencees, with little benefit being derived. The vast majority of licenced VHF and UHF radio installations such as the RNLI's, will clearly be well inside the defined safe EMF exposure guideline limits set by the ICNIRP and yet will have had expensive, limited resources allocated to demonstrating and recording that fact.