APPENDIX II - THE RESEARCH DIVING UNIT AND ICMR POLICY FOR RESEARCH DIVING

Introduction

The Research Diving Unit (RDU) housed within the Institute for Coastal and Marine Research (ICMR) supports marine research and other related academic programs, including consulting projects registered at the University, by providing access to diving and boating training, equipment, logistic support and expertise. Snorkelling is not considered diving and research projects relying on this mode for sampling do not pose a liability/risk to the University under the Diving Regulations. This does not mean that other hazards and risks associated with working in the marine environment under the OH&S Act do not have to be identified and mitigated for. It is important to understand that this is a living policy document, and will require regular review and updates.

Mandate of the Research Diving Unit

The mandate of the RDU is threefold. It should:

- 1. Provide and develop commercial diver and skipper capacity within the University through providing training, qualifications and experience to students and researchers.
- 2. Provide operational support for researchers to facilitate marine research.
- 3. Provide Safety, Health, Environmental and Quality Assurance in all its training, personnel, operations and equipment as legally enforced under the OH&S Act (85) 1993 and Diving Regulations 2009, amongst other legislation that may be applicable.

Structure of the Research Diving Unit

The Head of the RDU is an experienced commercial diving instructor, who reports to the ICMR Director. The RDU Head is responsible for:

- diving OH&S
- overseeing diving support for research
- offering diver training courses
- maintenance and replacement of RDU diving equipment

The RDU Head appoints contract personnel as required; this may include supervisor, skipper, diver and crew. This is an important legal structure which ensures the appointees are captured within the University OH&S framework as employees for remuneration and IOD purposes. No personnel can work as part of the dive team for the University unless appointed as such. For OH&S Act compliance, the RDU reports directly to the University OH&S officer.

Responsibilities of Client and Contractor

The law sees the RDU as a commercial diving *contractor* and all researchers that require its support for diving and boating operations are termed *clients*. The client is responsible for booking the required time for RDU support as well as the costs of the diving and boating operations. This is controlled by RDU legal documentation, which provides the following functions:

- 1. Track the RDU asset usage to meet SHEQ requirements. This is important should a claim for broken, stolen or lost equipment by submitted to our insurers.
- 2. Maintain a record of all operations for the scrutiny of the DoL Inspectorate for a period of 5 years.
- 3. Provide records of operations for personnel remuneration and client invoicing.
- 4. Provide an emergency backup plan for each operation should an incident occur.

It is therefore important that the researcher with signing rights on the research account signs this form before equipment is issued for each operation. These documents are issued by the ICMR

Secretary upon booking a diving/boating operation and must be completed and returned before the diving operation. The secretary will provide copies of this document; one to be retained by the researcher and the other to be handed in at the University access control point.

NMMU Research Diving Projects

All diving operations in support of research projects registered at the NMMU are to be conducted under the auspices of the RDU. Should these diving operations include divers not under contract to the RDU, such as on collaborative research projects with other entities, a diving logistics MoU must be in place to ensure the rights of collaborative divers are protected and there is no risk to NMMU. These registered research projects take first priority when clients book RDU support.

NMMU projects with other entities collaborating by a Memorandum of Understanding Each entity collaborating with NMMU on diving operations must sign a diving logistics MoU. This

document becomes proof that the particular entity commits to abide by the OH&S Act and Diving Regulations and conduct its diving operations in compliance of the law with respect to CoPs, personnel appointments, operational procedures, logistic requirements and SHEQ accountability. Diving projects registered under MoU's take second priority when booking RDU support.

Process for engaging the RDU for research projects requiring diving / boating support

Any researcher wishing to include diving/boating as a means of collecting, counting, observing, placing and recovering of biological, cultural and oceanographic instrumentation must approach the RDU in writing in the planning stage of the project design. This is to ensure that (i) a Diving Project Plan and Risk Assessment is completed by the RDU in conjunction with the project leader to meet legal requirements, (ii) the project leader is involved in the planning and budgeting of the diving/boating component of the project, and (iii) the RDU is aware of the additional logistical requirements of the project in relation to the Units planned scope of works for the year. Ideally the researcher will provide an annual schedule of activity/support.

Booking diving/boating support, priorities and charges

The RDU supports diving/boating operations of NMMU researchers, other ICMR members, collaborators under MoU's as well as commercial contracts. Ideally, projects should submit a written schedule of activities requiring support at the start of the project. Bookings for diving/boating support must be made in writing 5 days before the event. This is done online (email to RDU Head cc Secretary until online system up and running). The following information must be logged at this time: the name of the researcher and project, the type and nature of support needed, the launch ramp and site of the research, the number of personnel involved, the date, start and end time of the research. Additional operational documents provided are the DSTI and Register, both legal documents that allow us to close the SHEQ circle and provide remuneration and compensation for our appointed personnel.

In principle, the following ranking and rates will apply to RDU activities:

- First priority to NMMU researchers and RAs on registered projects, 30% standard rates apply.
- Second priority will be training courses and the rates shall apply per the priority rating of the trainee affiliation to the ICMR.
- Third priority to NMMU collaborators under MoU's, 50% standard rates apply.
- Fourth priority to public sector and NGO agencies who collaborate with NMMU, 75% standard rates apply.
- Fifth priority to commercial contracts to inject third stream finance into the RDU diving/boating support facilities and standard rates apply.

Charges are levied by the entity that supplies them in the case of boats and vehicles. Charges for personnel and equipment are levied by the RDU for auditing purposes. Charges, not including VAT, are tabulated below.

Law Enforcement and Compliance (for example abalone)

Members of the RDU are not authorised to support law enforcement and/or compliance diving, specifically operations to detain, arrest or recover evidence, for example in the form of abalone. Not only are the individuals involved in illegal abalone harvesting aggressive and known to intimidate the public, but this also has a negative impact on researcher's ability to collect data on illegal abalone harvesting to support natural resource management, reef community impacts, socio-economic and security studies. Furthermore, personnel of the RDU are not authorised to become involved in questionable diving practices under the auspices of other entities not representing NMMU. If the operation has NOT been logged with the RDU, or NO legal documentation is presented for signature prior to the operation, or the supervisor has NOT been appointed by the RDU, it is NOT an authorised diving/boating operation.

Intellectual Property

All data recorded during RDU diving/boating operations remains the property of the University or lead entity under a MoU. This includes still and video imagery. These cannot be distributed outside of the University without the necessary permission of the RDU and/or researcher. The public does not always agree with our research methods, although scrutinised by the ethics committee. Publication of such on social media could unnecessarily damage the image of marine science at the University.

Standard RDU rates (excluding VAT) Standard NMMU S&T rates apply overnight Researchers to provide equipment specific to project			
Equipment Rates		Personnel Rates	
Demand Valves 10/12 Itr Cylinders (with inserts) BCD/Harness Timer/Computer/Compass Shot Line (30m), Life Line (50m) Plastic Reel (50m), Wooden Reel (20m) Buoy (500mm), SMB, ISMB Site Marker System with .5 kg weight Camera with Lights (Sony / GoPro) Lift bag (100/250/500/1000) Dry Suit, Inner (Small, Medium, Large) Full Mask, Comms Medical Kit, Oxygen, Tools, Spares	R50 R50 R50 R30 R30 R30 R30 R150 R250 R250 R250	Supervisor daily (> 3 hr on site) Skipper daily (> 3 hr on site) Diver daily (> 3 hr on site) Crew daily (> 3 hr on site) Cylinder Fills Boat rental (per day) Vehicle rental (p/km) Medical cover and backup	R 1 500 R 900 R 675 R 350 R2/ltr R 3 500 R 4.50 R 250