

#### Minutes of the 40<sup>th</sup> ICNDT Meeting

#### (Agenda Items 12 – 18) Thursday 14<sup>th</sup> June 2018 – Gothenburg, Sweden

Present:	S K Babu A Bereson C Belinco P Wadyalkar G Aufricht J Conte M Mihovski L Obrutsky G Shen V Krstelj P Mazal J Toivonen E Martin A Erhard P Trampus D Joshi M Ghaemi E Tuberosa T Ogata J P Lee R Sliteris I Mukriz J Verkooijen L Dick F Hermansen T Chady B Alves A Stanciu J Grum H Jansen	ICNDT Chair/Singapore (NDTSS) America (ASNT) Argentina (AAENDE) Australia (AINDT) Austria (OGfZP) Brazil (ABENDE) Bulgaria (BGSNDT) Canada (CINDE) China (ChSNDT) Croatia (CrSNDT) Czech Republic (CNDT) Finland (Finnish NDT Society) France (COFREND) Germany (DGZfP) Hungary (MAROVISZ) India (ISNT) Iran (IRNDT) Italy (AIPnD) Japan (JSNDI) Korea (KSNT) Lithuania (LNBD) Malaysia (MSNT) Netherlands (KINT) New Zealand (NZNDTA) Norway (NSNDT) Poland (PTBNIDT/SIMP) Portugal (FSEND RELACRE) Romania (AROEND) Slovenia (SSNDT) South Africa (SAINT/SAIW)	Voting
	B Alves	Portugal (FSEND RELACRE)	Voting
	A Stanciu	Romania (AROEND)	Voting
	H Jansen	South Africa (SAINT/SAIW)	Voting
	F Gomez	Spain (AEND)/EFNDT Vice President	Voting
	P Merck W Schmid C H Chiang C H Gür C Bull	Sweden (FOP) Switzerland (SGZP) Taiwan (SNTCT) Turkey (TURK NDT) United Kingdom (BINDT)	Voting Voting Voting Voting

Participants	D Bajula	America (ASNT)	Non-Voting
-	J Ansler	Argentina (AAENDE)	Non-Voting
	N Ooka	Asia Pacific (APFNDT)	Non-Voting
	P Grosser	Australia (AINDT)	Non-Voting
	P Milligan	Australia (AINDT)	Non-Voting
	G Idinger	Austria (OGfZP)	Non-Voting
	Y Mizahev	Bulgaria (BGSNDT)	Non-Voting
	M Purschke	Germany (DGZfP)	Non-Voting
	P Anandan	ISNT India (ISNT)	Non-Voting
	M Carboni	Italy (AIPnD)	Non-Voting
	K Kubo	Japan (JSNDI)	Non-Voting
	N Yagi	Japan (JSNDI)	Non-Voting
	S Ooka	Japan (JSNDI)/Chair ICNDT WG4	Non-Voting
	Y Cho	Korea (KSNT)/WCNDT President	Non-Voting
	M Choi	Korea (KSNT)	Non-Voting
	H J Chung	Korea (KSNT)	Non-Voting
	K K Koh	Korea (KSNT)	Non-Voting
	Ohyang Kwon	Korea (KSNT)	Non-Voting
	S Hussein	Malaysia (MSNT)	Non-Voting
	R Klieber	Switzerland (SSNT)	Non-Voting
	E Romero	Spain (AEND)	Non-Voting
	D J Gilbert	United Kingdom (BINDT) – General Secretary	Non-Voting
	R Lyon	EFNDT	Non-Voting
	P Brisset	International Atomic Energy Agency (IAEA)	Non-Voting
	D Corcoran	ISO TC135 SC7 Chair	Non-Voting
	J Jimenez	ISO TC135 SC7 Chair	Non-Voting
	A Wooldridge	ICEC Secretary	Non-Voting
	M Farley	ICNDT Immediate Past Chairman	Non-Voting

**Proxies:** RSA – SAINT (South African Society for NDT) – SAIW

**Apologies:** Serbian Society for NDT

#### 12. Introduction to New Constitution

The Chair opened the  $40^{th}$  ICNDT meeting and welcomed from Federations, H Jansen, N Ooka, R Lyon and A Bereson.

D Marshall and W Schmid were confirmed as the auditors. The Chair to send a formal invitation.

Action Ref. No. 40 <sup>th</sup> ICNDT/2018- 06-14/	Desc.	WHO	STATUS/COMPLETE BY
1.	Formally invite D Marshall and W Schmid as the ICNDT Auditors.	S K Babu	Ongoing.

#### 12.1 <u>Membership Committee</u>

A copy of the report is attached. J Conte thanked members of the committee.

#### 12.2 <u>Communications/Internet/Journal</u>

A copy of the report is attached.

#### 12.3 WG1 Qualification and Certification

A copy of the report is attached.

#### 12.4 Certification Executive Committee

A copy of the report is attached.

M Farley thanked AINDT for questions on digital radiography.

#### 12.5 WG3 Research and Education Committee

A copy of the report is attached.

#### 12.6 <u>Confirmation of Committee/Working Group Chairs/membership</u>

There was no change to the WG Chairs other than C Belinco is Co-Chair of WG6.

#### 13. Progress report from 20th World Conference in Seoul, Korea

WCNDT is being held on 8-12 June 2012 at the COEX, Soul, Korea. Y Cho introduced the support team.

#### 14. Regional Group Reports

#### 14.1 Asia Pacific

N Ooka reported that the following events were taking place:

Malaysia 12-13 November 2018

India 19-21 December
ASNT 28-31 October
JSNDI 15-16 November

#### 14.2 Pan-America

J Conte reported on Latin America.

A Bereson reported on the Oil & Gas Advisory Board which deals with performance testing related to thickness measurement of pipes, TOFD etc.

#### 14.3 Europe

P Trampus reported. The EFNDT website is to be updated with the new OPs and new President details etc.

#### 14.4 Africa

H Jansen reported (copy attached).

#### 14.5 WG6 – Condition Monitoring

C Belinco reported (copy attached).

#### 15. Associated Bodies

#### 15.1 <u>IAEA</u>

C Belinco gave a presentation on a regional project consisting of 4-6 collaborating groups. The report is available to download from the website under Workshops and Presentations.

#### 15.2 <u>ISO TC135</u>

N Ooka and D Corcoran acknowledged the hard work of Sharon Bond and advised that there would be a systematic review of ISO9712.

#### 15.2 IIW

S K Babu reported that the MoU was signed in Shanghai and the details of the MoU were outlined at the Bali Conference.

A specific plan is being followed and IIW will be invited to participate in WG1.

#### 15.3 ASME

A preliminary meeting has been held regarding setting up a MoU between us.

#### 16. Forward Plans

#### 16.1 Update of Strategic Plan

M Farley advised that the 1<sup>st</sup> meeting of IAC would be taking place this afternoon but it would be a closed meeting. The meeting would be with the IEC and representatives of regions and will discuss priorities that ICNDT and regions might have and what may be included in Strategic Plan(s).

#### 17. Opportunity for comments by Members

The following ideas have already been offered:

- New routes to membership for countries that do not yet have a Society.
- Mediation disputes assistance.
- Promotion of national delegate/coordinator.
- Human factors.
- Liaison membership
  - What do we want from ASME?

C Bull suggested Diversity & Inclusion and outlined what BINDT is doing in this area.

J Verkooijen suggested that we need to avoid duplication in the MRA.

J Toivonen suggested statistics on numbers of inspectors etc. M Farley advised that work was already being done with regard to updating the list of certification bodies and market research reports.

R Lyon raised the age profile issue.

#### 18. Close of 40th ICNDT Meeting

Congratulations were extended to S K Babu and the meeting was closed.



#### "the World organization for NDT"

#### INTERNATIONAL COMMITTEE FOR NON-DESTRUCTIVE TESTING

### ICNDT MEMBERSHIP REPORT 2018 – May

Chair: J. Conte

Members: Alexander Mullin, David Gilbert, Ferid Herelli, Les Dick, Mike Farley, Shohei Ooka, Matthias Purschke and Sharon Bond.

- Review of the ICNDT Strategic Plan
   1.1 Action Plan "Support NDT Societies"
- 2. Contacts with Algerian and Lebanese societies to capture as members of ICNDT
- Contacts with institutions in Latin America, which develop NDT activities in countries that do not have national NDT Societies: ESPOL/Ecuador, CEADEN/Cuba and ITCR/Costa Rica
- 4. Contact with Caribbean entities to promote ICNDT's activities.
- 5. Pending registration form by Sri Lanka Association for Non Destructive Testing to become a full member of ICNDT.
- 6. **Confédération Marocaine pour les Essais Non Destructifs** has joined ICNDT as a full member
- 7. Review the proposal of the OP (Operating Procedures) NDT Societies Operation



#### WG1 on NDT Qualification and Certification

#### Report to ICNDT GA June 2018

#### COMMITTEE ADMINISTRATION

WG1 Action plan was updated on 15th of November 2017 in Singapore. Some updates were prepared to be approved at WG1 meeting in Gothenburg, Sweden (action plan attached).

Membership. Currently – 22 members representing the following countries: Austria, Australia, Brazil, Canada, China, Denmark, Germany, France, Japan, India, Iran, Republic of Korea, Russia, Serbia, Singapore, Spain, South Africa, Turkey, Ukraine, UK, USA (List of members attached). After Vienna meeting Ms. Helle Hansen Rasmussen replaced Mr. Bjørn Pedersen according to request of Danish NDT society. After Singapore meeting new members were approved: Diwakar D. Joshi (Indian Society for NDT) and Shohei Ooka (JSNDI, replaced Norikazu Ooka). Ji Jingyuan (ChSNDT) was reappointed in February 2018.

Forthcoming physical meeting will be on 13th of June 2017 in Gothenburg (Agenda attached).

#### **COMMUNICATION AND KNOWLEDGE SHARING**

There are four Qualification and Certification groups in ICNDT regions with which WG1 has communication through its members: Asia Pacific – S K Babu, P Milligan, EFNDT – M Purschke, R Rodriguez, Africa – H Jansen, Pan-America - J Rufino Filho, P.K. Yuen. Regional reports regarding certification activity are available at each WG1 meeting.

WG 1 has liaison and/or Observer status with relevant organizations: ISO TC 135 SC7 (Mike Farley, Alexander Mullin, IAEA (G Aufricht, R Holstein), ISO/CASCO WG 30 (SK Babu, Nicole Banks), ASME (ASNT representative), IAF (SK Babu), ICNDT WG6 (Peter Milligan).

WG1 keeps directory of NDT personnel certification bodies, with scopes of compliance, numbers of persons certificated and certificates issued, etc. Directory published on ICNDT web site and in ICNDT Guide to qualification and certification.

Qualification/Certification issues were discussed at the Workshop on NDT Laboratory Accreditation & Personnel Certification during 15<sup>th</sup> APCNDT in Singapore on 16<sup>th</sup> of November 2017. Date and place of next Q&C workshop will be defined at the meeting in Gothenburg.

#### GLOBAL HARMONISATION AND RECOGNITION

WG1 has developed recommendations on improvement of ISO 9712:2012. Recommendations as ICNDT submission according to ISO procedure were forwarded to ISO TC135 SC7 for Review of ISO9712:2012.

WG1 has nominated its members to represent ICNDT in ISO TC135 SC7 Task Groups dealing with revision of ISO 9712:2012: Sajeesh Kumar Babu (TG#1), Dave Bajula (TG#2), PK Yuen (TG#4), Harold Jansen (TG#5), Peter Milligan (TG#6), Alexander Mullin (TG#7).

Updated list of ISO/EN standards used for NDT of different products is available at each WG1 meeting.

Discussion about substitution renewal by recertification is continued, on-line survey among members was done and draft document will be presented in Gothenburg.

Third version of the document Clarification of functions and responsibilities of Certification body – Authorised Qualification body – Examination center has been forwarded to ISO TC135 SC7.

Second draft of the document Recommendation for grading of practical examination was prepared and will be discussed in Gothenburg.

Discussion on Interpretation of ISO 9712:2012 Table D.1 "Guidance on the percentile weighting for practical examination of Levels 1 and 2" for different NDT methods will be continued in Gothenburg.

Survey regarding surveillance for ISO 9712 particular case was done and results will be discussed in Gothenburg.

Actions "Survey of job-specific training and certification being carried out to supplement ASNT and ISO 9712 certification", "Discussion on how to deal with "experience requirements" in ISO 9712 leading to recommendations to ISO TC 135 SC7", "Harmonisation and recognition - risk and opportunity analysis", "Discuss if NDT Societies/PCBs could assess and approve employers" certification to ICNDT requirements", "Discuss if NDT Societies/PCBs could establish an expert group to oversee the inspection qualification activities", "Discuss possibility to set up a register of approved independent L3"s (or CM Category 3s or 4s) with available to control NDT/CM activities on-site" are ongoing.

#### WG1 members (rev. April 2018)

Name	Affiliation	e-mail
Alexander Mullin (Chair)	Russian Society for NDT	mullin@ndt-rus.ru
Gerhard Aufricht (1) or Gerald Idinger (2)	Austrian society for NDT	aufricht@mittli.at or g.idinger@oegfzp.at
Harold Jansen	South African IW	jansenh@saiw.co.za
João Rufino Teles Filho	Brazilian Society for NDT	rufino@rufinoteles.com.br
P.K. Yuen	Canadian Institute of NDE	puikei.yuen@canada.ca
Matthias Purschke (1) or Ralf Holstein (2)	German Society for NDT	pm@dgzfp.de or ho@dgzfp.de
Shohei Ooka	Japanese Society for NDI	shohei@jsndi.or.jp
Patrick Fallouey	Honoured member	Patrick.Fallouey@orange.fr
Andre Charbonnie	Cofrend	a.charbonnier@isgroupe.com
Rodolfo RodrÍguez	Spanish Society for NDT	r.rodriguez@aend.org
Arny Bereson and	American Society for NDT	ABereson@asnt.org
Dave Bajula		dbajula@acuren.com
Sajeesh Kumar Babu	NDT Society (Singapore)	skbabu@ndtss.org.sg
Vitaly Radko	Ukrainian Society for NDT	Garwardv@i.ua
Keith Arcus	Australian Institute for NDT	kcarcus1@bigpond.net.au
Nicole Banks	British Institute for NDT	nicole.banks@bindt.org
Kyung-Cho Kim	Korean SNT	robertkc.kim@gmail.com
Jingyuan Ji	Chinese Society for NDT	mib8888@163.com
Cemil Hakan Gur	Turkish NDT Society	chgur@metu.edu.tr
Goran Sofronic	Serbian Society for NDT	gsofronic@gmail.com
Mirmajid Ghaemi	Iranian Society for NDT	mirmajidghaemi@gmail.com
Helle Hansen Rasmussen	Danish NDT Society	hhr@force.dk
Diwakar D. Joshi	Indian Society for NDT	diwakarj@gmail.com

#### Observer status

Mike Farley	Past Chairman, ICNDT	mfarleyconsulting@btinternet.com
Tony Wooldridge	ICEC Secretary	tony.wooldridge1@gmail.com
David Gilbert	General Secretary ICNDT	David.Gilbert@bindt.org
Patrick Brisset	IAEA	p.brisset@iaea.org
Peter Milligan	Australian Institute for NDT	csm@aindt.com.au
Norikazu Ooka	Japanese Society for NDI	nori-ooka@rio.odn.ne.jp



### WG1 on NDT Qualification and Certification

Meeting of 13<sup>th</sup> of June 2018 (Wednesday) 08:00 – 12:00 Gothenburg, Sweden The Swedish Exhibition & Congress Centre

#### **AGENDA**

1. Welcome and Apologies	WG1 Chairman
2. Adoption of the Agenda	WG1 Chairman
3. Approval of the Minutes of the Meeting held on 15 November 2017 in Singapore	WG1 Chairman
4. WG1 Membership	WG1 Chairman
5. Action plan	WG1 Chairman
6. Representation of WG1 in TC 135 SC7 Task groups	WG1 Chairman
7. Current situation with revision of ISO 9712:2012.	D Corcoran
8. Improvement of OP19 and OP20	T Wooldridge
9. Substitution renewal by recertification.	R Holstein
10. Interpretation of Table D.1 of ISO 9712:2012	N Banks
11. Recommendation for grading of practical examination	WG1 Chairman
12. Task Group for discussion if NDT Societies/PCBs could assess and approve employers' certification to ICNDT requirements	V Radko
13. Task Group for discussion if NDT Societies/PCBs could establish an expert group to oversee the inspection qualification activities	R Rodriguez
14. Harmonisation and recognition - risk and opportunity analysis	PK Yuen
15. Surveillance	WG1 Chairman
16. Significant interruption. Reasons for exceptions.	N Banks
17. ICNDT Examination question bank (EQB)	T Wooldridge
<b>18.</b> Job-specific training and certification being carried out to supplement ASNT and ISO 9712 certification	H Jansen

**19.** Experience requirements in ISO 9712:2012 K Arcus

**20.** Information regarding ARCAL-IAEA project: "Advancing Non-Destructive Testing Technologies for the Inspection of Civil and Industrial Structures "

P Brisset

**21.** Report on the work of the ICEC T Wooldridge

**22.** WCNDT 2020. Certification related sessions Kim Kyung-Cho

**23.** Any other business members

24. Date and place of next meeting WG1 Chairman

## INTERNATIONAL COMMITTEE FOR NON DESTRUCTIVE TESTING



Working Group 1 on Qualification and Certification

**ICNDT ACTION PLAN 3: QUALIFICATION AND CERTIFICATION** 

Task Group: WG1

Task Group Leader: Alexander Mullin

Document title	Revision Date	Revised by	Scope of revision	Circulated to WG1
WG1-03_Action Plan	2009-08-17	JR Thompson	Synchronised with ICNDT Strategic Plan (revision 3A). NOTE: the ICNDT strategic plan is now at Rev 5	2009-08-24
WG1-03_Action Plan	2010-01-04	JR Thompson	Superficial review following the first WG1 meeting in Yokohama, and prior to an IEC virtual meeting in January 2010	2010-01-04
WG1-03_Action Plan	2010-01-18	JR Thompson	Reformatted and rationalised following IEC Teleconference	2010-09-12
WG1-03_Action Plan	2010-09-12	WG1	Reviewed and revised at Vienna meeting as required by WG1 ToR	2010-09-28
WG1-03_Action Plan	2011-06-10	WG1	Reviewed and revised at Valencia meeting as required by WG1 ToR an IEC	2011-07-01
WG1-03_Action Plan	2012-11-19	A Mullin	Reviewed and revised at Luton meeting	2012-11-19
WG1-03_Action Plan	2013-11-20	A Mullin	Reviewed and revised at Mumbai meeting	2013-11-20
WG1-03_Action Plan	2014-10-06	A Mullin	Reviewed and revised at Prague meeting	2014-09-23
WG1-03_Action Plan	2015-10-30	A Mullin	Reviewed and revised at Salt Lake City meeting	2015-10-08
WG1-03_Action Plan	2016-06-16	A Mullin	Reviewed and revised at Munich meeting	2016-06-06
WG1-03_Action Plan	2017-06-05	A Mullin	Reviewed and revised at Vienna meeting	2017-06-05
WG1-03_Action Plan	2017-11-15	A Mullin	Prepared and revised at Singapore meeting	2017-10-19
WG1-03_Action Plan		A Mullin	Prepared for Gothenburg meeting	2018-05-30

Assignments are proposed by the chairman for acceptance by the nominated WG1 member. Where primary and secondary (or backup) responsibilities are stated, this is to (a) spread the workload, (b) ensure continuity in the event that an individual ceases to be a WG1 member, and (c) improve the likelihood that at least one member responsible for a particular assignment will be in attendance at a WG1 meeting. It is up to the individuals assigned to a task to divide up the work between them.

	Action item / project	Cost €	Who?	When?	Progress / remarks	IEC decision
X	COMMITTEE ADMINISTRATION					
1	Regularly review and update the Group's objectives (this Action Plan).	Nill	A Mullin	at each physical meeting	Updated after Singapore meeting in 2017	
2	Regularly review and update (if required) the Terms of reference	Nill	A Mullin	Ongoing task (without deadline)	ToR revision 2013-11-20 is valid.	
3	Periodically review and refresh membership to ensure global representation	Nill	A Mullin	Ongoing task (without deadline)	After Singapore meeting new members were approved:  Diwakar D. Joshi (Indian Society for NDT) and Shohei Ooka (JSNDI, replaced Norikazu Ooka)  Ji Jingyuan (ChSNDT) was reappointed	
4	Define timetable for actions that should feed into the revision of ISO 9712	Nill	A Mullin D Corcoran			
A	COMMUNICATION AND KNOWLEDGE SHARING					
A1	Establish lines of communication with Qualification and Certification group(s) in ICNDT regions (Africa, Europe, America, Asia) with a view to co-ordination of activities.  Responsible WG1 member(s) to provide written report of regional meetings for circulation to WG1 members.	Nill	See remarks column	Ongoing task (without deadline)	Asia Pacific – S K Babu, P Milligan EFNDT – M Purschke, R Rodriguez Africa – H Jansen Pan-America - João Rufino Teles Filho, P.K. Yuen	
A2	Seek , maintain or re-establish liaison and/or Observer status with relevant					
	a). ISO TC135 SC7 and relevant WG	Nill	M Farley A Mullin	Ongoing task (without deadline)	ICNDT WG1 has official SC7 liaison status. ISO/TC 135/SC 7/WG 9 Revisions of training guidelines	

	b). International Accreditation Forum (IAF).	Nill	SK Babu	Ongoing task (without deadline)	SK Babu provides the liaison between ICNDT WG1 and IAF.	
	c). ISO/CASCO WG30 (revising ISO/IEC 17024)	Nill	SK Babu, Nicole Banks assists.	To be decided	To be discussed in Gothenburg	
	d). ASME and similar bodies on NDT personnel qualification matters	Nill	ASNT representative	Ongoing task (without deadline)	ASNT representative provides liaison	
	f). International Atomic Energy Agency (IAEA)	Nill	G Aufricht R Holstein	Ongoing task (without deadline)	Formal liaison with IAEA re-established with a view to co-operation on several matters.  See A3 below	
А3	IAEA					
A3.1	Plan programme of joint workshops		M Farley	Ongoing task	Draft plan programme of joint workshops in cooperation with P Brisset	
A3.2	Identify project ideas for global benefit		M Farley	Ongoing task	Cooperate with P Brisset on this matter	
A4	To keep up-to date directory of NDT personnel certification bodies, with scopes of compliance, numbers of persons certificated and certificates issued, etc.	Nill	A Wooldridge	Ongoing task (without deadline)	Directory published on the ICNDT web site should be kept up-to-date.	
A5	Provide assistance for developing countries seeking to establish national certification schemes.	Nill	P Milligan	Upon request	Procedure published in ICNDT Guide. Update if needed	
A6	Plan and organise a regular (annual or biennial) workshop on qualification and certification topics, inviting guest speakers with specialist knowledge/experience	Nill	A Mullin	as required	Date and place of Q&C workshop to be discussed in Gothenburg	
A7	Provide new and interesting material on qualification and certification in order to keep the ICNDT website updated.	Nill	D Gilbert / A Mullin	Ongoing task (without deadline)	WG1 members are responsible to forwarding matters of interest through WG1 chairman to D Gilbert	
A8	Identify possibility to create unified body of knowledge based on gap analysis between TR 25107, CP106 and Tec.Doc 628	Nill	R Holstein	Awaiting developments in ISO TC 135 SC7	ISO is proceeding with revision of TR 25107, under WG9 of SC7. ICNDT should participate in particular sub-	

				WG9	groups.
A9	Organise periodical meetings with ASNT to discuss personnel certification matters	Nill	A Mullin M Farley	Ongoing task	Next meeting is to be decided
A10	Seek opportunities for engagement in the Middle East, including organising a WG1 meeting and workshop at a conference there.	Nill	A Mullin M Farley	Ongoing task	Suspended
A11	Establish liaison with ICNDT WG6 in terms of CM personnel certification	Nill	P Milligan	Ongoing task	
В	GLOBAL HARMONISATION AND RECOGNITION				
B1	Review and update the ICNDT Guide and Recommendations on NDT personnel Qualification and Certification.	Nill	D Gilbert, WG1 members	Ongoing task	ICNDT Guide to Qualification and Certification has been updated and published in June 2016 to WCNDT 2016
B2	Participation in maintaining of ICNDT Examination question bank (EQB)	Nill	WG1 members	Upon request of IEC	Functions of WG1 are defined in OP-23.
В3	Develop the table of ISO standards used for NDT of different products.	Nill	A Mullin WG1 members	Ongoing task	Table should be kept up-to-date.
B4	Consider substitution renewal by recertification	Nill	R Holstein	Ongoing task	ICNDT now inputting to relevant ISO TC135 SC7 Task Group. Survey of WG1 to be carried out.
B5	Clarification of functions and responsibilities of Certification body – Authorised Qualification body – Examination center	Nill	A Mullin WG1 members	as required	ICNDT now inputting to relevant ISO TC135 SC7 Task Group
B7	Prepare ICNDT guidelines on the impact of Human Factors on reliability of NDT executed by certificated personnel.	Nill	TBD	Ongoing task	Action suspended as ICNDT International Specialist Group on the same matter is going to be created  To be considered further in the light of the ICNDT workshop in Singapore.
В7	Survey of job-specific training and certification being carried out to supplement ASNT and ISO 9712 certification	Nill	H Jansen	Ongoing task	To be discussed in Gothenburg
В8	Discussion on how to deal with "experience requirements" in ISO 9712 leading to recommendations to ISO TC 135 SC7	Nill	K Arcus	Ongoing task	To be discussed in Gothenburg

В9	Develop recommendation for grading of practical examination.	Nill	A Mullin WG1 members	Ongoing task	To be discussed in Gothenburg	
B10	Interpretation of ISO 9712:2012 Table D.1 "Guidance on the percentile weighting for practical examination of Levels 1 and 2" for different NDT methods.	Nill	Nicole Banks	Ongoing task	Discussed in Singapore, November 2017. Continues	
B11	Harmonisation and recognition - risk and opportunity analysis	Nill	PK Yuen	Ongoing task	To be discussed in Gothenburg	
B12	Review options for training and certification in civil engineering and opportunities for ICNDT to add value	Nill	A Mullin WG1 members	Ongoing task	Organize review of certification in civil engineering among PCBs	
B13	Discuss if NDT Societies/PCBs could assess and approve employers' certification to ICNDT requirements	Nill	Vitaly Radko	November 2017	To be discussed in Gothenburg	
B14	Discuss if NDT Societies/PCBs could establish an expert group to oversee the inspection qualification activities	Nill	Rodolfo Rodriguez	November 2017	Revised questionnaire being issued (May 2018)	
B15	Discuss possibility to set up a register of approved independent L3's (or CM Category 3s or 4s) with available to control NDT/CM activities on-site	Nill	A Mullin	November 2017	Discussed in Singapore, November 2017	
B16	Participation in ISO 9712 revision process	Nill	A Mullin M Farley WG1 members	2020	ICNDT is represented on each of the ISO TC135 SC7 Task Groups set up to consider the comments submitted. Further actions to be discussed in Gothenburg	
B17	Clarification of surveillance for ISO 9712 particular case	Nill	Vitaly Radko	Ongoing task	To be discussed in Gothenburg	



# Report from the ICNDT Certification Executive Committee (ICEC) for 2017

Compiled by Tony Woodridge. Secretary ICEC

Presented by Harold Jansen, Chairman ICEC

### **Contents**

- Responsibilities of ICEC
- Status of ICNDT Multi-lateral Recognition Agreement OP19
- Current activities for Conformity Assessment OP20
- ICNDT Examination Question Bank



## ICNDT Multilateral Recognition Agreement (MRA) - Current Status of Schedule 1

44 National Societies, which are Members of ICNDT have signed the ICNDT MRA Schedule 1:

Argentina, Australia, Austria, Belgium, Brazil, Bulgaria, Canada, China, China Taiwan, Colombia, Croatia, Czech Republic, Denmark, Finland, France, Germany, Greece, Hungary, India, Iran, Israel, Italy, Japan, Kazakhstan, Malaysia, Mexico, Netherlands, Poland, Portugal, Romania, Russia, Serbia, Singapore, Slovakia, South Africa (SAINT & SAIW), South Korea, Spain, Sri Lanka, Switzerland, Turkey, Ukraine, UK and Uzbekistan.

They have thereby agreed to recognise the certification awarded by the Personnel Certification Bodies (PCBs) which are registered with ICNDT under Schedule 2.



## ICNDT Multilateral Recognition Agreement (MRA) - Current Status of Schedule 2

14 Personnel Certification Bodies (PCBs) are registered with the ICNDT MRA Schedule 2:

AINDT Australia,
ABENDI Brazil,
ChSNDT China,
Inspecta Sertificinti Finland,
SECTOR Cert Germany,
Hobeon SKO Netherlands,
UDT-CERT Poland,

RELACRE Portugal
RTC Russia,
SAIW Certification South
Africa,
NDTSS Singapore,
NCNDT Sri Lanka.
PCN UK,
Ukr-SRINDT Ukraine



### ICNDT Multilateral Recognition Agreement (MRA)-Recent changes to signatories

Recent signatories to MRA Schedule 1 (National Societies)

Mexico May 2017

Uzbekistan May 2017

Sri Lanka June 2017

Argentina August 2017



### ICNDT Multilateral Recognition Agreement (MRA)-Recent Changes to Registrations

Recent new registrations to MRA Schedule 2 (Personnel Certification Bodies)

NDTSS – Singapore July 2017

NCNDT - Sri Lanka October 2017

### Recent renewals of registration to MRA Schedule 2 (PCBs)

UKrSRINDT Ukraine January 2017

RELACRE Portugal
March 2017

RTC Russia March 2017

AINDT Australia
July 2017

PCN UK July 2017

Inspecta Sertifiointi Finland August 2017

NCNDT Sri Lanka
October 2017

2017 was a very busy year for ICEC MRA review teams.

THANK YOU for your hard work and dedication



The World Organisation for NDT

### ICNDT Multilateral Recognition Agreement (MRA)-Other activities

#### **Schedule 2 Applications in Progress**

- DSD Malaysia
- ChSNDT China
- China Taiwan

#### **Revision of Operating Procedure OP19**

A revision of OP19 has been circulated for comment by ICEC and IEC and the final version is expected to be approved this week.



## ICNDT Conformity Assessment of Personnel Certification Bodies

- In situations where independent accreditation of PCBs is not available or considered sufficient, ICNDT may offer a conformity assessment to support an application for registration under the MRA Schedule 2.
- There were no conformity assessment audits required during 2017. However one audit has been performed during 2018 for ChSNDT, and following completion of corrective actions, approval by ICEC is awaited.

## The ICNDT Examination Question Bank – What does it offer?

- The EQB comprises:
  - A stand-alone database application;
  - Containing over 7,000 multiple-choice questions;
  - Covering Levels 1, 2 and 3;
  - General and sectors (aerospace, welds, castings, etc.);
  - Available currently in English and Spanish;
  - Compliant with the latest issue of ISO 9712.



## The ICNDT Examination Question Bank – Scope of Questions

- Methods and sectors covered are:
  - Radiation safety: General;
  - Materials Science: Multi-sector;
  - Time of Flight Diffraction: Welds;
  - Visual Testing: In-Service Inspection, General;
  - Magnetic Particle Testing: In-Service Inspection, General;
  - Penetrant Testing: In-Service Inspection, General;
  - Eddy Current Testing: Aerospace, General, In-Service Inspection, Tubes, Welds, Wrought products;
  - Radiographic Testing: Aerospace, Castings, General, In-Service Inspection, Welds;
  - Ultrasonic Testing: Aerospace, Castings, General, In-Service Inspection, Welds, Wrought products.

### **The ICNDT Examination Question Bank – Users**

PCBs in six countries have purchased the EQB.

 One country has been provided with a free copy in return for translation of questions into Spanish.

## The ICNDT Examination Question Bank – Current activities

Under a project funded by the IAEA, Argentina is leading the translation into Spanish of new questions on phased array ultrasonic and digital radiography. Once translation and validation is complete, these new topics will be added to the EQB database.

ICEC is reviewing options for the future development of the EQB. These options concern both the examination questions themselves and the method of delivering the examination papers to users.



WG3 (Education and Research) Report to the 40<sup>th</sup> GA, Gothensburg Sweden, June 14<sup>th</sup>, 2018 at the 12<sup>th</sup> ECNDT

• Review of the previous meeting minutes (Singapore, Nov 2017, 17th APCNDT)

Dr. Mike Farley

Current Status and Meetings

1) Members:

Mr. M. Johannes (former chair, retired, South Africa)

Prof. Younho Cho (Chair, Pusan Natl Univ/ KSNT, Korea) – WCNDT2020 President

Dr. Antonio "Tony" Erhart (Vice chair, Germany)

Prof. Steve Holland (US) - Leonard Bond QNDE

Ms (Dr.) Ekaterina Cheprasova (Russainan NDT society)

Prof. Vjera Krstelj (Croatian NDT Society) - NDT Academia

Mr. (Dr.) Harold Jansen (SAIW South Africa)

Prof. Marc Kreutzbruck (U of Stuttgart, Germany)

Mr. Kevin Smith (ASNT US)

Dr. Uwe Ewert (BAM Germany)

Mr. (Dr.) Robert Smith/Kevin Newton (BINDT, UK)

Prof. Serge Dos Santos (INSA, Cofrend, France)

Prof. Norbert Meyendorf (Iowa State Univ, WFNDEC, US) - Paul Scchafbuch?

Prof. Krishnan Balasubramanian (IIT Chennai, ISNT, India)

ANO Inida

Prof. Chungguang Xu (BIT, ChsNDT, China)

??? (to be expanded on the recommendation)

Plus

Dr Mike Farley (Immediate Past Chair of ICNDT)

Dr. Sajeesh K. Babu (Chair of ICNDT), ICNDT IAC

2) Topics for the NDT specialist groups (sub groups)

(Leading society)

Full Matrix Capture BINDT UK (Pual Wilcox)

Terahertz Imaging BINDT UK

Microwave ASNT US (K. Smith)

Magnetic Memory Hungarian NDT Society, BINDT (P. Trampus, M. Farley)

NDT of Art BINDT (M. Farley)

NDT reliability DGZFP

Nonlinear UT DGZFP (M. Kreutzbruck)

Guided Wave Ultrasound KSNT ( Y Cho )

???

3) Meetings

Munich, Germany June 2016, 19<sup>th</sup> WCNDT Long Beach, CA US, Oct. 2016, ANST's 75<sup>th</sup> Anniversary conference Singapore, Nov 2017, 17<sup>th</sup> APCNDT Gothensburg Sweden, June 2018, 18<sup>th</sup> ECNDT

(to be planned)

Manchester UK July 2018, EWSHM in association with IWSHM community Notthingham UK, July 2018, Laser Ultrasound Conf Burlington VT, US, July 2018, QNDE, in association with WFNDEC Burges Belgium, Sep 2019, ICU in association with ICU community Mexco City, Mexico, Oct 2019, PANNDT Conf Seoul South Korea, June 2020, 20th WCNDT

Additional on-line meetings could be arranged if needed

- Strategic Plan and Action Items
- 1) Draft of OP for Proceedings (Mr. D. Gilbert at BINDT)

To be reviewed and revised at upcoming meetings

- 2) Update of ICNDT Guideline
  - Draw up a list of schools
  - Draw up a list of NDT Texts, Handbooks, Magazines and Technical Journals
- 3) Expansion of WG3 by increasing the number of registered NDT bodies (planned to be made up to 20 bodies by the end of 2017) such as IIW, ASME PVP, EPRI NDE Center, WFCNDE, ICU, IWSHM, FENDT etc.
- 4) Organizing the NDT specialist group Workshops (Sessions) in upcoming ICNDT meetings including the 20<sup>th</sup> WCNDT, Seoul South Korea, June 2018

- 5) Collaboration with WG4 (communication) to update the on-line NDT technical stuffs and information on Wikipedia and others etc.
- 6) Collaboration with ISO TC to come up with new proposals on emerging NDT technologies
- 7) Setting up a educational program for the youth and developing countries
- 8) Launching a technical journal via ICNDT to enhance its reputation in NDT academic fields in terms of technical depth and to help ICNDT budget
- Miscellaneous



## African Federation of NDT – AFNDT 2017 / 2018 Report



#### **AFNDT Membership**

(Signatories to the AFNDT Constitution - Adopted April 2014)

#### Full Membership:

a.	Algeria	Research Center in Industrial Technologies	CRTI
b.	Angola	National Technological Centre	CTN
C.	Cameroon	Hydrocarbures-Analyses-Controles	Hydrac
d.	Ghana	Ghana Atomic Energy Commission	GAEC
e.	Kenya	Kenya Bureau of Standards	KEBS
f.	South Africa	South African Institute of Non-Destructive Testing	SAINT
g.	Sudan	Sudanese Society For Nondestructive testing	SSNDT
h.	Tunisia	Mechanical & Electrical Industries Technical Centre	(Cetime)
i.	Morocco		Comend
j.	Libya	Welding Center Tripoli - Advanced Occupational Centre for Welding Technology	

#### Secretariat & Associate Member:

k. South Africa Southern African Institute of Welding SAIW

#### **AFNDT President**

During the 7<sup>th</sup> African Conference of Non-Destructive Testing (ACNDT 2016) that was held in Oran, Algeria Dr SAHAIMI Kamal from Commend in Morocco, was elected as the new AFNDT president replacing Dr ZERGOUG Mourad from Algeria.

#### **AFNDT Annual General Assembly**

Due to challenges relating to communication and personnel availability, no AFNDT AGM was held during 2017.

An AFNDT AGM is scheduled for October 2018 to be held in South Africa.

#### **AGM - AGENDA ITEMS**

- Establish a Regional AFRA / AFNDT project to promote NDT standardisation and infrastructure development
- 2) Establish communication channels and protocols
- 3) Align the AFNDT constitution with that of ICNDT
- 4) Initiate and grow NDT infrastructure in each African country National society, Standardisation / Industrial / NDT Scheme committees, ATB's, ExC, PCB's & AQB's – initially regional, then sub-regional then national + have ICNDT MRA 1 signatories (ICNDT Main Members) in each country
- 5) Initiate an African MRA (Mutual recognition agreement) once (4) is established, and link to International community via ICNDT.
- 6) AFNDT Conference 2019 / 2020 Morocco

#### **ACTION LIST / 2018 OBJECTIVES**

**Objective**: The intent of this effort is to represent a fully 'operational' African Federation for NDT at the 2020 World Conference in South Korea, and hopefully to have a large contingent from Africa presenting papers and participating in the event. :

Operational refers to the following

- 1) Registered commercial entity
- 2) Website
- 3) Generating funds either self generating / sponsorships
- 4) Addressing ICNDT fees and ensure payment for all members
- 5) All 54 countries represented in AFNDT (currently only 16 countries)
- 6) Quarterly meetings teleconference + 1 annual AGM
- 7) Regional action plan & strategy

#### **QUALIFICATION & CERTIFICATION ACTIVITIES**

Qualification and Certification of NDT personnel I mainly performed according ISO 9712 and ASNT SNT-TC-1A, with limited local personnel involved in inspections (except in South Africa)

Main PCB's / Certification schemes active in Africa:

- 1) BINDT PCN
- 2) COFREND
- 3) SAIW Certification SAQCC-NDT

## Regional Report at ICNDT

## Report of APFNDT

Asia Pacific Federation for Non-Destructive Testing www.apfndt.org

Dr. Norikazu Ooka

President of APFNDT

14th June 2018 Sweden



## Report of APFNDT

- \* 1. Members of APFNDT
- \* 2. Advisory Group Meeting
  - \* In Singapore, 12<sup>th</sup> Nov., 2017
- \* 3. Executive Committee & Board Meeting
  - \* In Singapore, 13<sup>th</sup> November, 2017
- \* 4. General Assembly I & II Meeting
  - \* In Singapore,14<sup>th</sup> and 15<sup>th</sup>, Nov., 2017



## 1. Members of APFNDT

Full Members, 15 societies (2017 - 2020)

AINDT - The Australian Institute for Non Destructive Testing

ASNT - The American Society for NDT

ChSNDT - The Chinese Society for Non Destructive Testing

**CINDE - Canadian Institute for NDE** 

ISNT - The Indian Society for Non-Destructive Testing

JSNDI - The Japanese Society for Non-Destructive Inspection

KSNT - The Korean Society for Nondestructive Testing

MSNT - The Malaysian Society of Non Destructive Testing

NDTSS - Non-Destructive Testing Society (Singapore)



\*Board Members

## Members of APFNDT

NZNDTA - New Zealand Nondestructive Testing Association Inc.

RSNTTD - The Russian Society for Non Destructive Testing and Technical Diagnostics

SNTCT - The Society for Nondestructive Testing and Certification of Taiwan (SNTCT)

PSNDT - Philippine Society for Nondestructive Testing, Inc.

AZNDT (Azerbaijan NDT Society) 2017~

SNDT - Society for Non Destructive Testing, Sri Lanka

\*Board Members



### Members of APFNDT

Associate Member, 8 societies (2017 – 2020)

BSNDT - The Bangladesh Society for Non Destructive Testing

ISNDT - Indonesian Society for Non Destructive Testing

MSNDT - Mongolian Society for Non Destructive Testing

PASNT - Pakistan Society for NDT

Under formation - Myanmar Society for Non Destructive Testing

TSNT - Thai Society for Non Destructive Testing

VANDT - Vietnam Association for Non Destructive Testing

SNDT – NDT Board, Sri Lanka



### 2. Advisory Group Meeting

\* Chairman advised that the Inaugural AG group had met this week for the very first time.

\*

\*

\* With Members of the AG as requested by the President being, known active delegates (all being prior APCNDT Presidents):

\* 2003: Prof. Kwon, 2006: Mr. Dick,

\* 2009: Dr. Ooka, 2013: Dr. Venkatraman



2. Advisory Group Meeting

- Review of last meeting
- Report of Present Status in APFNDT
  - Membership
    - Journal and Newsletters
    - Communications & Website
      - Operating Procedures
      - Finances
- APFNDT Awards
- Report of Strategic plan
- Reports of Task Group
- \* ICNDT matter
  - Structural Change

### Conference matters

- Report on 15<sup>th</sup> APCNDT Preparation
- Update on 16<sup>th</sup> APCNDT Preparation
- Advice on bids for 2025
- Tasks for next/new Board meeting



Asia Pacific Federation for Non Destructive Testing

### 2. Advisory Group Meeting

\* Chairman outlined the AG proposals in assisting with ongoing activities:

\* Membership Growth: The whole of the AG were tasked with assisting the Membership TG and driving growth

\* Strategic Plan: Mr. Dick (as General Secretary), would continue with this activity as an AG role.

\* Education and Training: Dr. Venkatraman agreed to lead this role

\* Guidelines for Common Practices: "ALL members were tasked with this matter"



\*

### 3. Executive Committee & Board Meeting

- General APFNDT matters
- Membership

Finances

\*

Journal and Newsletters

\*

Communications & Website

- Operating Procedures
- \* Review of Strategic plan
- \* Reports of Task Groups
- Report of Advisory Group
- \* ICNDT matters

- Structural Changes
  - ICNDT Press Release

- \* Conference matters
- Report on 15<sup>th</sup> APCNDT Preparation
  - Update on 16<sup>th</sup> APCNDT Preparation
  - Advice on bids for 2025
- Tasks for next/new Board meeting



### 4. General Assembly I Meeting

- \* Minutes of the Previous (Mid Term) GA Meeting in Malaysia 2015
- Executive and Board Member Nominations/Introductions
- \* ICNDT Restructure update
- \* AFNDT Documentation
- Constitution
- Operating Procedures
- Strategic Plan

Financial Reports

- Income/Expenditure
  - Budget for coming year

### Reports by APFNDT internal committees and task groups

- Advisory Group Report
  - Task Group Reports
    - Asia Pacific Conference Reports

17th APCNDT 2025 Presentations



4. General Assembly II Meeting

- \* New Members:
- \*

Sri Lanka (SNDT)

\*

Philippine's (PSNDT)

\*

- Azerbaijan (ANDT)
- \* Executive and Board Member Elections
- \*

- President and Vice President
- General Secretary and Treasurer

\*

- Group One and Group Two Board Members
- •
- Group Three Board Members
- \* Asia Pacific Conferences
  - Report on APCNDT 2017 (Singapore)
  - Report on APCNDT 2021 (Australia)



Asia Pacific Federation for Non Destructive Testing

# Report of APFNDT Members of APFNDT 2017, Singapore



# 3. APFNDT Executive Committee & Board Meeting

### 1. 2015 GA Minutes for approval

### 2. Budget/Finance

Secretariat has included "ALL" expenses being incurred, against financial inputs by JSNDI & membership fees. This would give a more accurate view of the costs of running the Federation.

### 3. 2017 Election Process

- Executive
- Board

General Secretary and Secretariat to work on a process and voting forms

### 4. Constitution & OP's

Secretary general had started the process of comparing these documents for distribution to the AEC well before the GA for comment & review. With the ICNDT OP's & new Constitution still to be ratified in 2018.



# 3. APFNDT Executive Committee & Board Meeting

### 5. Strategic Plan

The Strategic Plan Which was completed by general secretary be approved for release as part of the upcoming GA documentation.

### 6. APCNDT 2017 progress update

Currently 80 booths have been sold, so they are almost at capacity and reported that there were 270 Abstracts, with 244 of these unique. Paying Registrations at this time were at 151 as of Aug 18th, however this was growing every day, with in-excess of 500 hundred participants expected.

### 7. Honorary Members/Awards

General Secretary to formally seek nominees for the awards process from Full Member Societies.

#### 8. Nomination of a new Auditor

General Secretary had received one formal nomination and an email saying new auditor.



# 3. APFNDT Executive Committee & Board Meeting

### 9. 2025 APCNDT Bids

Secretariat stated that at as of closing date there were actually four (4) bids received: ASNT, MSNT, KSNT and ChSNDT

### 10. Other Business

- APFNDT president requested an Advisory Group Meeting on 12<sup>th</sup> Nov (1 hour) prior to the AEC meeting in Singapore.
- The possibility for an APFNDT BOD dinner during APCNDT as was usual was requested.
- Website Updates: Noted is the need to update the information on the website:

**Executive Information** 

OP's need to be added

Society information up to date as possible (full member esp)

The bidders for 2025



### **TG1 Membership**

\* With no formal report being available, the new Chair gave a brief verbal report advising of the THREE (3) new members and that their Certificates would be handed out in Singapore

#### TG<sub>2</sub> APFNDT Journal

\* With the TG meeting planned for the next day, there was nothing to report. However noted is that there has been no activity thus far.

### **TG3 Communications and website**

\* The website had been updated, however with little or no information being passed on, newsletters were still not getting traction.

### **TG4 Education and Training**

\* The ISNT's work on display materials and posters was presented. Appearing to be some impressive work, now available for APFNDT use.

### **TG5 Certification**

\* No report, but there would be a meeting in Singapore.

#### **TG6 Standards**

\* Chairman of TG6 is still recruiting members, therefore the TG was inactive at this point. But there would be a meeting in Singapore.



\* Board Positions (2017 Election results):

for Non Destructive Testing

```
Group One (2 positions) ← two nominees
 Mr. A Mullin (RSNDTT) and Mr. DJ Varde (ISNT)
*
 Group Two (Four positions) ← five nominees
 Prof. CH Chiang (SNTCT), Dr. GT Shen (ChSNDT), Dr. MY
  Choi (KSNT), Dr. T Ogata (JSNDI)
*
  Group Three (Two positions) ← three nominees
 Mr. P Wadyalkar (AINDT) and Mr. G Tubrett (CINDE)
```

President: Dr. N Ooka (JSNDI)

- \* Vice President: Prof JP Lee (KSNT)
- \* \( \bigsize \text{two nominees}
- \* General Secretary: Mr. L Dick (NZNDTA)
- \* Treasurer: Mr. K Smith (ASNT)
- \* Past President: Dr. B Venkatraman (ISNT)
- \* 16<sup>th</sup> APCNDT President: Mr. P Grosser (AINDT)
- \* Auditor: Mr. SK Babu (NDTSS)



- \* Report from 15<sup>th</sup> APCNDT Progress (Singapore 2017)
- \* The 15th APCNDT is hosted by the Non-destructive Testing Society (Singapore) from the 13th to 17th November 2017
- \* Participants: 80% Foreign Delegates, from 42 Countries, 80 Exhibition Booths, and as of 11<sup>th</sup> Nov 654 Registered Delegates (without Day Registrations).
- \* The conference was successfully completed.



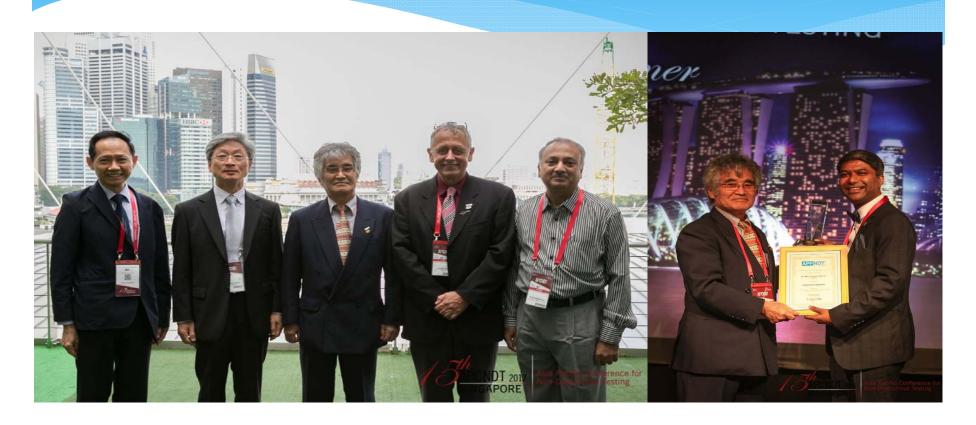
### Awards and Honorary Membership

```
Recognition of Outstanding Voluntary Effort in NDT Award:
            Dr. Brian Stephen Wong NDTSS, Dr. David Chu (SNTCT)
  APFNDT Award: Mr. Thiam Siong Sze (NDTSS),
                  Dr. Takamasa Ogata (on behalf of JSNDI)
*
*
 APFNDT Distinguished Service Award: Mr. John Maccarone (AINDT)
 APFNDT Travel Award: Mr. Aswin Haridas (Singapore Student)
  Honorary Membership: Mr. Sajeesh K Babu (NDTSS)
```



**AG** members

Honorary Member (Mr. Babu)



### **2025 APCNDT Bids**

At as of closing date there were actually four (4) bids received: ASNT, MSNT, KSNT and ChSNDT

Û

- \* The winning bid was to be the ASNT, would host the 2025 event in Hawaii
- \* APCNDT 2021, Melbourne Australlia
- \* WCNDT 2020, Soul Korea
- \* MINDTCE(Malaysian International NDT Conference and Exhibition) 2018 in conjunction with APFNST, 12-13Nov., Subang Jaya, Malaysia



# Report of APFNDT from NDTSS 2017 to AINDT 2020



### Schedule on APFNDT Meetings

Year	Event	Place	AEC	Board Meeting	<b>General Assembly</b>
2016	WCNDT 2016	Munich	Yes	Yes	No
2017	15 <sup>th</sup> APCNDT	Singapore	Yes	Yes	Yes
2018	ECNDT	Gothenburg, Sweden	yes	yes	
2019	Regional Event	TBA	Yes	Yes	Yes
2020	WCNDT	Seoul	Yes	Yes	No
2021	16 <sup>th</sup> APCNDT	Melbourne	Yes	Yes	Yes



Asia Pacific Federation for Non Destructive Testing

\* Thank you for your attention!





### The World Organisation for NDT

### Brief report to the ICNDT from the ICNDT's Working Group 6

### **Condition Monitoring**

Conferences

#### **WCNDT 2020**

WG6 in collaboration with the ISCM is doing an intensive preparation for WCNDT 2020; this was discussed several times with the ICNDT Chair via email.

The agreed plan is to organize:

- multiple CM structured sessions
- invited overview presentations related to hot topics for CM
- workshops and seminars
- publication of the best CM papers from the WCNDT in the International Journal of CM and the best case studies in the International Newsletter Condition Monitor

#### The Second World Congress on CM, 2021

WG 6 is doing an intensive preparation for WCCM 2021; this was discussed several times with the ICNDT Chair via emails.

#### CM/NDT publications

WG6 agreed about preparation of a special issue of the International Journal of CM to cover CM/NDT topic, an issue will appear in 2019

WG 6 was involved in publication of the best CM papers from the WCNDT 2016 and WCCM 2017 in the International Journal of CM

WG 6 was involved in publication of the best CM case studies from the WCNDT 2016 in the International Newsletter Condition Monitor

#### • CM/NDT Continuing Professional Development

WG6 is organizing CPD related to CM/NDT in Nottingham, at CM/MFPT 2018

 CM/NDT joint grant application with ICNDT/ISCM involvement as dissemination partners (e.g. Horizon 2020, etc.)

WG 6 is planning to make H2020 grant application with the ISCM as a Partner; the deadline is Nov 2018

• Joint CM/NDT cross-forums

WG6 was involved in planning a plenary keynote lecture in Nottingham at CM/MFPT 2018 that will combine CM/SHM/NDT topics

WG6 is involved in organizing "invited overview speakers" covering CM/SHM/NDT at CM/MFPT 2018

ICNDT award related to CM/NDT cross activity

The Co-Chairs of the WG6 are planning to prepare a draft of T&C for an award

CM/NDT higher education

WG6 made cycle of lectures at Gdansk Polytechnic University, Poland, related to CM and NDT. The second cycle of lectures related to signal processing for CM and NDT in the same University is underway.

The next WG 6 meeting in person will be in Nottingham, at CM/MFPT 2018 Co-Chairs of the WG 6
Len Gelman and Cesar Belinco



### SECRETARIAT OF ISO/TC 135/SC 7 NON-DESTRUCTIVE TESTING - PERSONNEL QUALIFICATION CANADA (SCC)

Ms. Jennifer Jimenez International Secretary Canadian General Standards Board

Tel: (873) 469-3225 Fax: (819) 956-5740 Gatineau, Canada

K1A 1G6

Email: jennifer.jimenez@tpsgc-pwgsc.gc.ca

May 28, 2018

ISO/TC 135/SC 7

### REPORT OF THE SECRETARIAT ISO/TC 135/SC 7 PERSONNEL QUALIFICATION

#### 1. Membership

- 1.1 "P" Members (34): Argentina (IRAM), Australia (SA), Austria (ASI), Belgium (NBN), Brazil (ABNT), Canada (SCC), China (SAC), Czech Republic (UNMZ), Finland (SFS), France (AFNOR), Germany (DIN), Hungary (MSZT), India (BIS), Indonesia (BSN), Iran, Islamic Republic of (ISIRI), Italy (UNI), Japan (JISC), Kazakhstan (KAZMEMST), Korea, Republic of (KATS), Malaysia (DSM), Netherlands (NEN), Norway (SN), Philippines (BPS), Poland (PKN), Romania (ASRO), Russian Federation (GOST R), South Africa (SABS), Spain (UNE), Sweden (SIS), Switzerland (SNV), Ukraine (DSTU), United Kingdom (BSI), United States (ANSI), Zimbabwe (SAZ).
- 1.2 "O" Members (10): Bulgaria (BDS), Colombia (ICONTEC), Croatia (HZN), Denmark (DS), Kenya (KEBS), New Zealand (NZSO), Portugal (IPQ), Slovakia (SOSMT), Sri Lanka (SLSI), Thailand (TISI).

#### 1.3 **Leadership:**

#### Canada

Mr. Darcy Corcoran – International Chair *pending outcome of TC 135 CIB ballot* Ms. Jennifer Jimenez – International Secretary

Ms. Sharon Bond – International Chair now retired

#### 2. Liaisons

#### 2.1 Internal:

ISO/TC 17/SC 19 – Steel -Technical delivery conditions for steel tubes for pressure purposes

ISO/TC 108/SC 5 - Condition monitoring and diagnostics of machines ISO/CASCO - Committee on conformity assessment

#### 2.2 External:

International Atomic Energy Agency (IAEA)
International Committee for Non-Destructive Testing (ICNDT)

#### 3. ISO International Standards published

**ISO 9712:2012** Non-destructive testing -- Qualification and certification of NDT personnel \*\*new edition work currently underway as a result of the last systematic review

**ISO/TS 11774:2011** Non-destructive testing -- Performance-based qualification \*\*confirmed in 2016

**ISO 18490:2015** Non-destructive testing -- Evaluation of vision acuity of NDT personnel

**ISO 20807:2004** Non-destructive testing -- Qualification of personnel for limited application of non-destructive testing \*\*confirmed in 2014

**ISO/TS 22809:2007** Non-destructive testing -- Discontinuities in specimens for use in qualification examinations \*\*confirmed in 2014

#### 4. Work items

4.1 ISO/TS 25107 Non-destructive testing -- Guidelines for NDT training syllabuses \*\*approved for publication by SC7, at ISO for editing ISO/TS 25108 Non-destructive testing -- Guidelines for NDT personnel training organizations \*\*approved for publication by SC7, at ISO for editing ISO/NP TS 21759 Non-Destructive testing -- Guidelines for training, qualification and certification of non-destructive testing engineers (coordinator) \*\*moved to TC 135 for further development work

#### 4.2 Working groups:

Working Group 9 – Revision of training guidelines