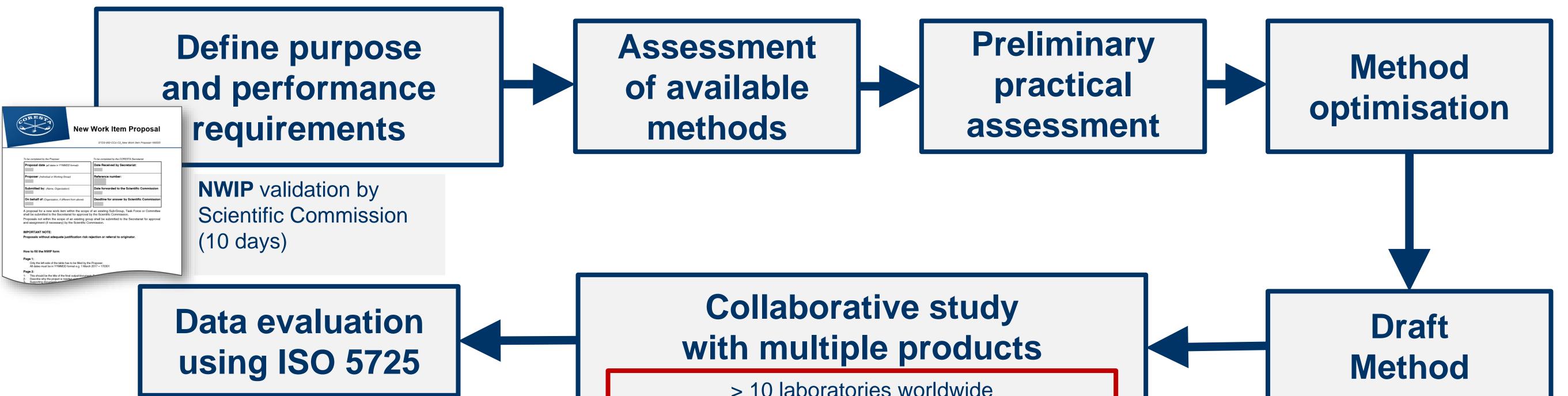
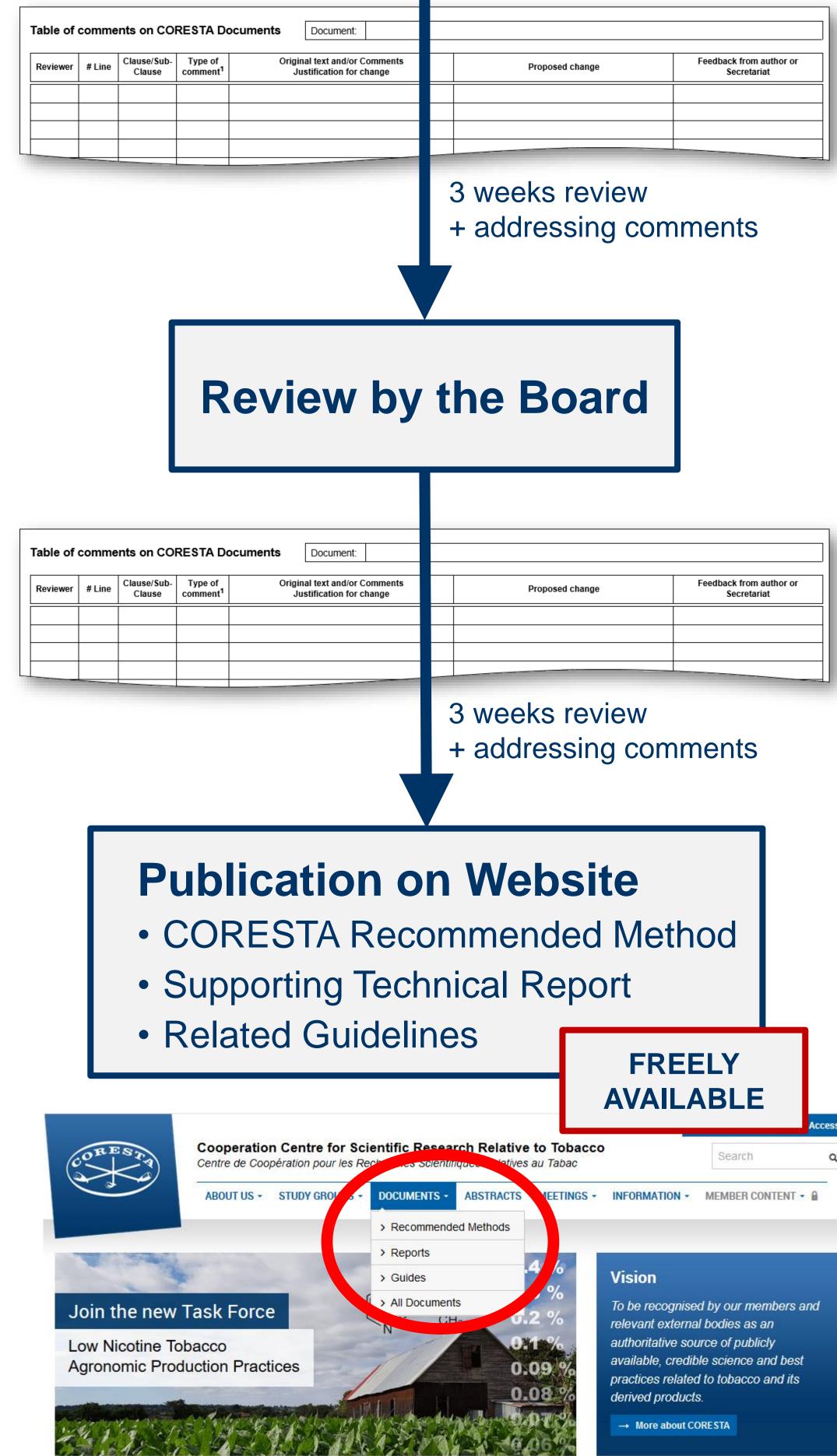


# **CORESTA Approach** for development of robust methods



## **Review by the Scientific Commission**



> 10 laboratories worldwide

(In-house, independent, government, academia ...)

### **CORESTA Recommended Methods and their ISO equivalent**

CRM	TITLE	Update	ISO equivalent
01	Determination of Dithiocarbonate's in Tobacco	1978	6466:1983
02	Determination of Organochlorine Pesticide Residues on Tobacco	Out 2014	4389:2000
04	Determination of Maleic Hydrazide Residues in Tobacco	Out 2013	4876:1980
05	Determination of CO in the Mainstream Smoke of Cigarettes by Non-Dispersive Infrared Analysis	1993	8454:2007
06	Measurement of Ventilation: Definitions and Measurement Principles	2016	9512:2002
07	Determination of Nicotine in the Mainstream Smoke of Cigarettes by Gas Chromatographic Analysis	1991	10315:2002
08	Determination of Water in the Mainstream Smoke of Cigarettes by Gas Chromatographic Analysis	1991	10362-1:1999
12	Determination of Alkaloids in Cigarette Smoke Condensate	1968	3400:1997
12	Cigarettes - Determination of Water in Smoke Condensates - Karl Fischer Method	1990	10362-2:1994
16	Lamina Strip Particle Size Determination	1991	12194:1995
17	Stem Content of Lamina Strips	1991	12195:1995
20	Determination of Alkaloids in Manufactured Tobacco	1968	2881:1992
21	Atmosphere for Conditioning and Testing Tobacco and Tobacco Products	1991	3402:1999
22	Routine Analytical Cigarette-Smoking Machine: Specifications, Definitions and Standard Conditions	1991	3308:2000
23	Determination of Total and NFDPM using a Routine Analytical Cigarette-Smoking Machine	1991	4387:2000
20	Determination of TPM and Preparation for Water and Nicotine Measurements	1991	4307.2000
24	Cigarettes - Sampling	1991	8243:2006
33	Determination of Acetate in Cigarette Paper	1993	20370:2009
34	Determination of Citrate in Cigarette Paper	1993	20369:2009
35	Determination of Total Alkaloids (as Nicotine) in Tobacco (Continuous Flow Analysis)	$\rightarrow$ CRM85	15152:2003
36	Determination of Nitrate in Tobacco and Smokeless Tobacco Products (Reduction to Nitrite and CFA)	2015	15517:2003
37	Determination of Reducing Substances in Tobacco by Continuous Flow Analysis	2010	15153:2003
38	Determination of Reducing Carbohydrates in Tobacco by Continuous Flow Analysis	2010	15154:2003
39	Determination of the Purity of Nicotine and Nicotine Salts (Gravimetric Analysis-Tungstosilicic Acid)	1994	13276:1997
40	Determination of Air Perm. of Materials used as Cigarette, Plug Wrap and Tipping Papers	Out 2017	2965:2009
41	Determination of the Draw Resistance of Cigarettes and Filter Rods	2007	6565:2002
42	Atmosphere for Conditioning and Testing Fine-Cut Tobacco and Fine-Cut Smoking Articles	1997	15592-2:2001
43	Fine-Cut Tobacco - Sampling	1997	15592-1:2001
50	Environmental Tob. Smoke - Determination of Nicotine and 3-Ethenylpyridine in the Vapour Phase	2002	18145:2003
51	Environmental Tob. Smoke - Determination of Particulate Matter by UV Absorbance and Fluorescence	2002	15593:2001
52	Environmental Tob. Smoke - Estimation of its Contribution to Respirable Suspended Particles	2002	18144:2003
54	Determination of Nicotine and NFDPM in Sidestream Smoke	2011	20773:2013
55	Determination of CO in the Vapour Phase of Cigarette Sidestream Smoke	2011	20774:2013
56	Determination of Water in Tobacco and Tobacco Products by Karl Fischer Method	2018	6488:2004
57	Determination of Water in Tobacco and Tobacco Products by Gas Chromatographic Analysis	2018	16632:2003
58	Determination of Benzo[a]Pyrene in Cigarette Mainstream Smoke (GC-MS)	2018	22634/1:2008
70	Determination of Selected Volatile Organic Compounds in Mainstream Smoke of Cigarettes (GC-MS)	2018	21330:2018 NP 23923
72	Determination of TSNA in Tobacco and Tobacco Products by Liquid Chromatography (MS/MS)	2017	21766:2018
74	Determination of Selected Carbonyls in Mainstream Cigarette Smoke (HPLC)	2019	21160:2018 NP 23922
75	Determination of TSNA in Mainstream Cigarette Smoke (LC-MS/MS)	2019	19290:2016
78	Determination of Selected Phenolic Compounds in Mainstream Cigarette Smoke (HPLC-FLD)	2018	NP 23904 / -905
79	Determination of Ammonia in Tobacco and Tobacco Products by Ion Chromatographic Analysis	2018	21045:2018
81	Routine Analytical Machine for E-Cigarette Aerosol Generation and Collection – Def. & Std Conditions	2015	20768:2018
83	Determination of Ammonia in Mainstream Cigarette Smoke by Ion Chromatography	2017	NP 23919 / -920
85	Tobacco - Determination of the Content of Total alkaloids as Nicotine (CFA with KSCN/DCIC)	2017	NP 22980

### **CORESTA Guidelines**

GUIDE TITLE		Update
01	Agrochemical Guidance Residue Levels (GRLs)	2018
02	Phosphine Fumigation Parameters for the Control of Cigarette Beetle and Tobacco Moth	2019
03	Good Agricultural Practices (GAP) Guidelines	2005
04	A User Guideline for the Measurement of Pressure Drop of Cigarettes and Cigarette Filter Rods	2019
05	Technical Guideline for Pesticide Residues Analysis on Tobacco & Tobacco Products (with Technical Notes)	2016
06	A User Guideline for the Use of Balances for Cigarettes and Cigarette Related Products	2009

Upcoming Meetings

15 - 18 September 2019

AP2019: programme and list of papers updated 03/09/2019

SSPT2019: programme and list of papers updated 29/08/2019

News

CORESTA Recommended Methods and ISO Correlation List updated 26/08/2019

Project 235 launched: RFT SG - Presentations Boards on CORESTA and RFT SG, University of Kentucky Burley Tobacco Tour, Aug 2019 26/08/2019

Project 233 launched: CORESTA - Oral Presentations at INVESTA Congress, Havana, Cuba, Dec 2019 23/08/2019

Guides No. 26 - Technical Guide for Designing E-Vapour Product Stability Studies 05/09/2019

Latest Documents

27/08/2019

Guides No. 9 - Freezing Parameters for the Control of Cigarette Beetle and Tobacco Moth Second edition

Guides No. 12 - Controlled Atmosphere Parameters for the Control of Cigarette Beetle and **Tobacco Moth** Third edition 27/08/2019

73rd TSRC - Tobacco Science Research Conference Lansdowne Resort and Spa, Leesburg, VA, USA 17 September 2019

SG PTM - Physical Test Methods Munich, Germany 5 October 2019

SG SMA - Smoke Analytes Hamburg, Germany

5 October 2019 SG PUB - Product Use Behaviour Hamburg, Germany

> 5 October 2019 obacco Products

### www.coresta.org

07	A Scale for Coding Growth Stages in Tobacco Crops	2009
80	CORESTA Monitor Test Piece Production and Evaluation Requirements	2009
09	CigFreezing Parameters for the Control of Cigarette Beetle and Tobacco Moth	2019
10	Lamina Strip Particle A User Guideline for the Measurement of Diameter of Cigarettes and Filter Rods	2011
11	Technical Guideline for Sample Handling of Smokeless Tobacco and Smokeless Tobacco Products	2011
12	Controlled Atmosphere Parameters for the Control of Cigarette Beetle and Tobacco Moth	2019
13	Guidance for Sampling the Tobacco Leaf Supply Chain	2012
14	A User Guide for the Determination of the Diffusion Capacity (D*) of Cigarette Papers	2019
15	CORESTA Reference Products - Production and Evaluation	2014
16	Molecular Markers in Tobacco	2019
17	Sustainability in Leaf Tobacco Production	2016
18	Sample Handling and Sample Collection of E-Cigarettes and E-Vapour Generating Products	2016
19	Responsible Use of Crop Protection Agents (CPAs) in Tobacco Leaf Production	2017
20	Biomarker Studies - Requirements for the Certification of Analytical Reference Standards	2017
21	Best Practices and Crop Protection in Cigar Dark Air-Cured Tobacco	2017
22	Technical Guide for the Selection of Appropriate Intense Vaping Regimes for E-Vapour Devices	2018
23	Placement of Data Loggers in Air-cured Barns and Data Logger Maintenance	2019
24	Sample Handling of Mentholated Cigarettes and Cut Filler	2019
25	Technical Guide for Aerosol Collection and Considerations when Testing E-Vapour Product Technologies	2019
26	Technical Guide for Designing E-Vapour Product Stability Studies	2019

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