



### World Radiocommunication Seminar 2016 12-16 December, Geneva, Switzerland

# Online tools and electronic communication means for terrestrial services

Andrea Manara

Broadcasting Services Division International Telecommunication Union







The eBCD2.0 platform for broadcasting services
 eQuery, ePub, eTools, myAdmin
 Integration of outgoing correspondence in myAdmin

- Online Validation and eMIFR tools for all terrestrial services
- Conclusion and outlook: Towards a fully electronic BR for terrestrial services?











Bring the BR closer to Administrations with addedvalue services

- Provide access to up-to-date broadcasting data
- Provide access to Special Section at publication date
- Provide calculation-on-demand services in the scope of broadcasting agreements and relevant propagation models
- Help administrations in following more easily plan modification procedures and related deadlines



### Outcome

- **Reduce workload on both BR and administrations**
- **Reduce the need for printed documents**

Portal description







- Secure communication with administrations (https)
- ➢ In production since 2010

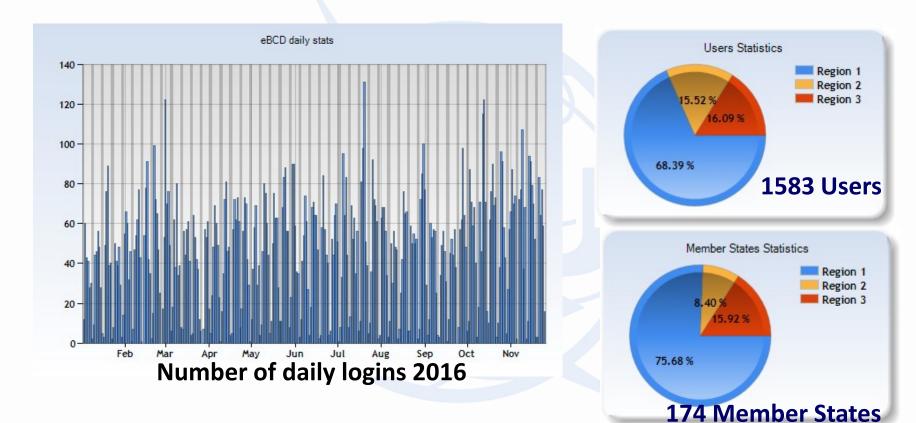












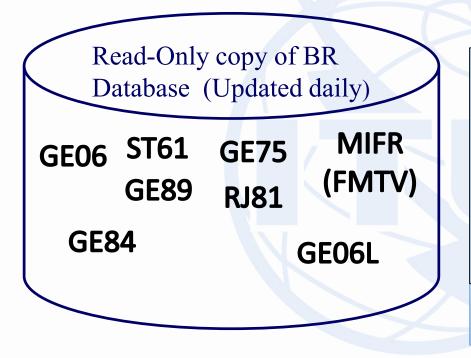
Last month statistics: ~60 logins/day, 237 users, 92 Administrations







## "Online search on Plans and MIFR"



## Search by:

- Administration
- Geographic Area
- Frequency
- Administration Unique Identifier
- BR Identification number
- Status (Recorded/Published)
- Site/Allotment name
- GE06: Contour ID, Plan Entry, Assignment code, TV chan., Frequency block

Generate e-notice file (Export to SGML)

- GE06D under testing. Target deliver March 2017
- LF/MF under testing.

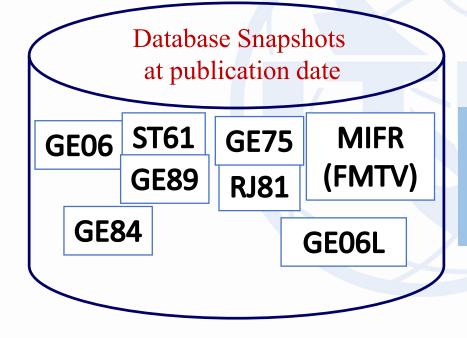
Notice generation reusing TerRaNotices software (SOA)











## Search by:

- BR IFIC number
- Administration
  - My notifications
  - Notifications which affects me











### "On-demand test calculations"

#### **GE06**

- GE06D Plan Modification
- (Coordination/Conformity)
- GE06A Coordination
- **GE06D** Compatibility
- **GE06D** Compatibility (ATU)
- **GE06D** Compatibility (ASMG)

#### RJ81

- Plan Modification
- What-if studies
- What-if studies configurable Enom

#### **GE84**

 Compatibility Analyses (with integrated notice validation)

#### Propagation

• ITU-R P1812v4 Point to Point



• ITU-R P1546 Point to Area

### **Notice Generation**

Notice Generation (Export to SGML output)









#### **2016 statistics**

More than 2000 jobs run by 188 users from 88 Administrations

Calculation Type	# Job
GE06D Plan Modification (Coordination/Conformity)	638
<b>GE06D Compatibilities</b>	313
GE06A Coordination	13
ITU-R P.1812	106
RJ81 Plan modification	44
GE84 compatibility	342
ITU-R P.1546	108
Notice Generation	752

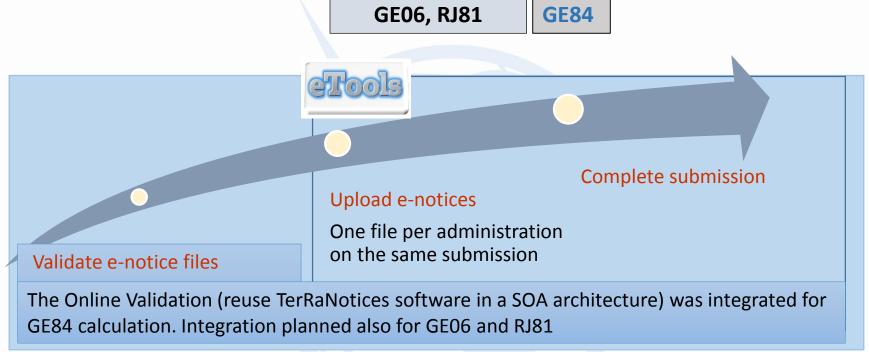






## eTools: e-notice submission







The ITU distributed processing infrastructure will treat your test submission and inform you at completion!



Check your TIES account!

yourTIESname@ties.itu.int





## eTools: job processing





tices

#### Test Packages: click to hide all

Job Id	Job Name	Job Job Type Status		Date of Request Date of Start Run I		Date of Completion	Process	Elapsed Time (minutes)
<u>6167</u>	degert_0	Success	Art4_PlanModification	11/12/2012 3:10:52 PM	11/12/2012 3:11:02 PM	11/12/2012 3:11:59 PM	BR-GE06-2_2	1
<u>14157</u>	test	Success	Art4_PlanModification	11/20/2014 4:55:08 PM	11/20/2014 4:55:09 PM	11/20/2014 4:56:42 PM	CALC1_46	2
<u>14145</u>	manara_0	Failed	Art4_PlanModification	11/19/2014 3:21:33 PM	11/19/2014 3:21:38 PM	11/19/2014 3:22:13 PM	CALC1_22	1

#### ☑ Test Packages 10717: click to show all



job id	job name	job status
10717	MOZ-Nairobi	Failed

#### Job Input

Job Output: ERROR

Adm	E-notice file	Nu	mber of No
MOZ	MOZ 19 07 2013.txt		179

#### Please contact <a href="mailto:brbcd@itu.int">brbcd@itu.int</a> if the error message is unclear

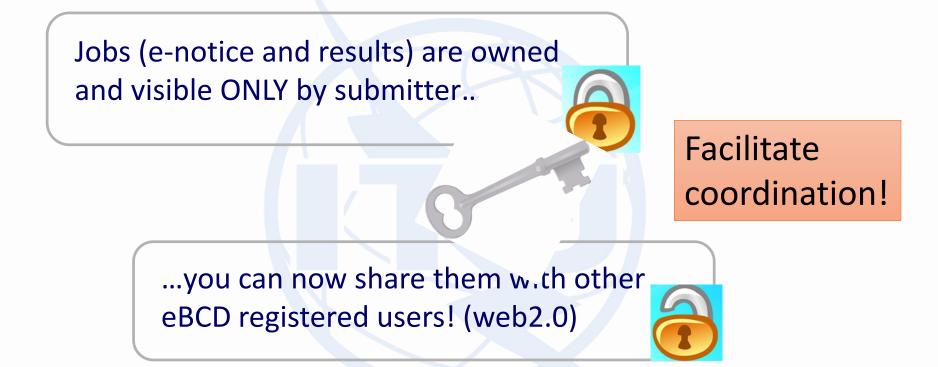


Problem parsing notices: target not found for TB5 notice where t\_adm\_ref\_id = MOZ1305361 target not found for TB5 notice where t adm ref id = MOZ1305364



## eTools: privacy and collaboration





Around 200 jobs shared by 72 users from 45 Administrations

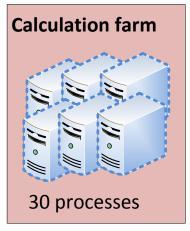




## eTools: back-end infrastructure



 30 independent processes currently available in ITU servers for calculations.



**Processes distributed in** such a way to minimize waiting time.



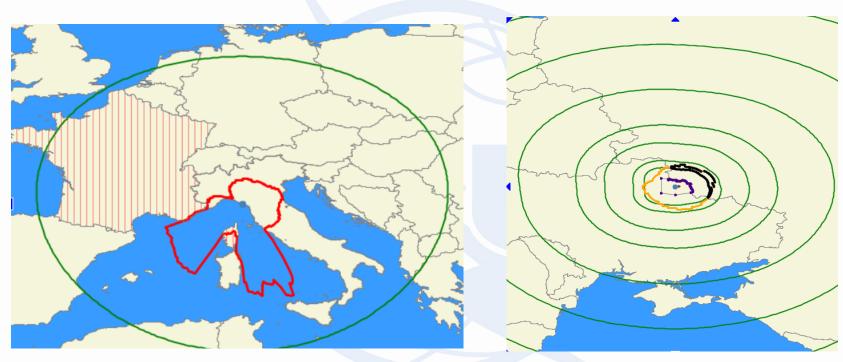
The BR has the knowledge (2012 pilot project) to integrate external cloud resources if needed (and regulations permit).





## eTools: GE06D plan modification





**Coordination examination** 

Conformity examination

More during GE06 workshop!





## eTools: GE06 compatibility analyses



Interference calculations between new notices (from electronic notification files) and existing plan notices and recorded assignments/allotments

j	ob id	job name	job status			
1	4168	test	Success			
) In	put					
o In Idm	put E-notice file	2	Number of Notices			

ATU planning (2012-2013)

ASMG planning (2014-2015)

**COMTELCA** planning (2017)

More during GE06 workshop!

Results available for one-month only!

Download results

Results is an MS Access mdb file for download to be visualized with GE06Calc.





### eTools: RJ81 plan modification and what-if studies



eTools Disclaimer eTools	Documentations	CITEL requests (2014-201	5)
The processing system is cur	rently ONLINE (28 processes available)		
Please select the calculation	type		
RJ81	<ul> <li>RJ81 what-if studies</li> </ul>	Beta Release	
Job Input			
Adm E-notice file	Number of Notices	D104	
ARG <u>ARG 13493 IN.txt</u>	2	RJ81	
Job Output		Plan Modification	
Proposed Modification 760kHz_LU6	Administrations with incompatibilities CHL B ARG	What-if studies	
700KH2_E00	CHE B ARG		

What-if studies configurable Enom •

Proposed Modification	Administrations with incompatibilities						
760kHz_LU6	CHL B ARG						
1140kHz_LU22	CHL ARG						
Select the proposed modification	Select the affected protected station						

All •	All

#### Results sw\_50%\_A sw\_BC gw\_D gw\_N

ID Number	Frequency Assigned (kHz)	Country	Station Name	of	BR Serial Number Affected	Frequency Assigned Affected (kHz)	Country	Station Name Affected	Class of Station Affected		Time of Operation	Azimuth (deg)	Distance (km)	Symbol	Protected Value (mV/m)	NFS (mV/m)	NFS or EU before (mV/m)	EU after (mV/m)	) Not
1	760	ARG	LU6	в	090001717	760	в	PLANALTO	в	Α	N	0	14	Y	2.65	2.39	4.56	5.15	_
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	Α	N	20	14	Y	2.65	2.39	4.56	5.15	•
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	А	N	40	14	Y	2.65	2.39	4.56	5.15	•
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	А	N	60	14	Y	2.65	2.41	4.56	5.16	
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	Α	N	80	14	Y	2.65	2.42	4.56	5.16	r
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	Α	N	100	14	Y	2.65	2.44	4.56	5.17	C
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	Α	N	120	14	Y	2.65	2.46	4.56	5.18	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	А	N	140	14	Y	2.65	2.48	4.56	5.19	~
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	А	N	160	14	Y	2.65	2.5	4.56	5.2	S
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	Α	N	180	14	Y	2.65	2.51	4.56	5.21	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	Α	N	200	14	Y	2.65	2.51	4.56	5.21	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	А	N	220	14	Y	2.65	2.5	4.56	5.2	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	А	N	240	14	Y	2.65	2.49	4.56	5.2	
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	Α	N	260	14	Y	2.65	2.48	4.56	5.19	
1	760	ARG	LU6	В	090001717	760	В	PLANALTO	В	Α	N	280	14	Y	2.65	2.46	4.56	5.18	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	Α	N	300	14	Y	2.65	2.44	4.56	5.17	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	A	N	320	14	Y	2.65	2.42	4.56	5.16	
1	760	ARG	LU6	в	090001717	760	В	PLANALTO	В	A	N	340	14	Y	2.65	2.4	4.56	5.16	
1	760	ARG	LU6	В	081010190	760	в	CANDELARIA	С	A	N	200	11	Y	4.18	3.63	7.25	8.11	

If there is interest we can organize a RJ81 training session during WRS!









JOD SU	mma	ry <u>Dele</u>	<u>ete</u> <u>s</u>	Share	
j¢	ob id	:	job name	e job status	
2	9866		test	Success	
Job Inj	put				
Adm	E-not	ice file		Number of Notices	
HRV	HRV a	amendment notice	<u>e.txt</u>	1	
Configura	ation I	nformation			
🗹 Top 20	) only	Consider Tip	🖉 TV also	so 🕜 Polarization Discrimination (dB) 🛛 1	0
Job Ou	tput				

	Input notice file validated by	y the OnlineValidation process on 10/10/2016 4:09:57	PM
[	Proposed Modification	Administrations with which the limits of 4.3.7.1/4.3.7.2 are exceeded	Eu (dB(µV/m))
	87.8MHz_BOGOMOLJE BI	IH HRV SVN SRB I GRC	93.579
1			

### More during GE84 workshop!

Export Results to Excel

#### GE84 Compatibility Analyses Description

Select the proposed modification 87.8MHz\_BOGOMOLJE

Results Interference To Interference From

Assign ID	Adm	Intent	Stn Cls	Frequency	Polar	Site Name	Total Distance (km)	Sea Path	Warm Sea Path (km)	super	ERP (dBW)	Azimuth (deg)	Protection Ratio (dB)	NFS (dB (µV/m))	EU Ref (dB (µV/m))	Proposed EU (dB (µV/m))	Current EU (dB (µV/m))	EU increase (dB (µV/m))
084005671	BIH	RECORDED	BC	87.8	м	CAPLJINA	51	0	19	0	30							5.471
084006190	HRV	RECORDED	BC	87.7	н	BABINO POLJE	61	0	55	0	27.1	136	33	79.33	84.221	89.068	86.734	2.334
084006380	HRV	RECORDED	BC	87.9	н	LASTOVO	42	0	42	0	15	193	33	76.784	88.541	90.056	88.492	1.564
084005599	BIH	RECORDED	BC	87.8	м	FOCA KMUR	143	0	20	0	30	74	37	69.607	96.018	96.208	96.048	0.16
084005728	BIH	RECORDED	BC	87.8	н	JAJCE JEZERO	134	0	9	0	29.5	5	37	69.399	83.394	90.162	89.735	0.427
084005611	BIH	RECORDED	BC	87.9	М	KONJIC B	91	0	16	0	30	58	25	66.226	89.715	89.697	89.472	0.225
084006435	HRV	RECORDED	BC	87.7	н	MOLUNAT	137	0	53	0	29.8	122	25	61.07	82.625	83.407	83.155	0.252
084006572	HRV	RECORDED	BC	88	н	STON	64	0	39	0	29.9	121	7	58.611	95.551	95.057	95.048	0.009
084006629	HRV	RECORDED	BC	87.7	н	VRLIKA	100	0	10	0	24.6	333	25	57.545	81.403	93.97	93.956	0.014
084005512	BIH	RECORDED	BC	87.7	М	ним	138	0	15	0	30	53	25	57.075	94.988	96.202	96.196	0.006
084005730	BIH	RECORDED	BC	87.9	н	KAKANJ	141	0	11	0	30	39	25	56.38	109.908	109.91	109.91	0
084006200	HRV	RECORDED	BC	87.8	н	BIOGRAD	160	0	29	0	17.4	307	37	55.344	78.313	94.045	94.037	0.008
084102538	GRC	RECORDED	BC	87.8	н	AGNANTIA	392	0	288	0	26	140	37	51.682	80.518	129.753	129.753	0
084005737	BIH	RECORDED	BC	87.9	М	KLADANJ	183	0	13	0	30	48	25	50.908	91.894	91.874	91.872	0.002
								-		-								





## eTools: ITU-R P.1812 calculations



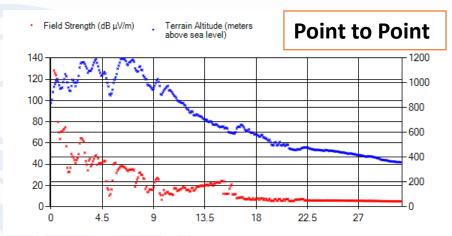
Beta Release!

Propagation prediction model using terrain profile

30 MHz -3 GHz
0.25 km - 3000 km
1% < time < 50%</li>
1% < locations < 99%</li>

SRTM3 terrain database 3 arc-sec resolution (90 m) Planned to move to 1 arc-sec (30m) early 2017











## eTools: ITU-R P.1546 calculations



### Beta Release!

Propagation prediction model

- ➢ 30 MHz −3 GHz
- ➢ 1 km − 3000 km
- ➢ 1% < time < 50%</p>
- ➢ 50% locations

Terrain database can be used to improve accuracy

Could also be adapted for location probabilities in the range (1% - 99%) Point-to-area prediction of field strength for the broadcasting, land mobile, maritime mobile and certain fixed services (e.g. those employing point-to-multipoint systems)







## myAdmin



"My own office for broadcasting services @ ITU: opening ~24/7"

CR 408: Restricted access to focal point only since November 2016 for myAdmin and e-mail notification services.

#### eBCD Focal Points

AFG	0	AFS	0	AGL	1	ALB	0	ALG	3	AND	0	ARG	0	ARM	0	ARS	2	ATG	0	AUS	1	AUT	5
AZE	1	В	0	BAH	0	BDI	0	BEL	4	BEN	2	BFA	0	BGD	0	BHR	2	BIH	1	BLR	2	BLZ	0
BOL	2	BOT	0	BRB	0	BRM	0	BRU	0	BTN	0	BUL	3	CAF	0	CAN	0	CBG	0	CHL	0	CHN	3
CLM	0	CLN	0	CME	6	COD	0	COG	0	СОМ	0	CPV	0	CTI	2	CTR	0	CUB	0	CVA	1	CYP	2
CZE	2	D	2	DJI	0	DMA	0	DNK	1	DOM	0	E	0	EGY	2	EQA	0	ERI	0	EST	2	ETH	0
F	7	FIN	5	FJI	0	FSM	0	G	6	GAB	0	GEO	2	GHA	0	GMB	0	GNB	0	GNE	0	GRC	0
GRD	0	GTM	0	GUI	0	GUY	0	HND	0	HNG	7	HOL	0	HRV	0	HTI	0	I	0	IND	2	INS	0
IRL	3	IRN	0	IRQ	0	ISL	0	ISR	0	J	0	JMC	0	JOR	0	KAZ	0	KEN	0	KGZ	0	KIR	1
KNA	0	KOR	1	KRE	0	KWT	0	LAO	0	LBN	0	LBR	0	LBY	0	LCA	0	LIE	0	LSO	0	LTU	0
LUX	1	LVA	2	MAU	0	MCO	0	MDA	1	MDG	0	MEX	0	MHL	0	MKD	0	MLA	3	MLD	0	MLI	0
MLT	2	MNE	0	MNG	0	MOZ	0	MRC	4	MTN	0	MWI	0	NCG	0	NGR	0	NIG	0	NMB	0	NOR	4
NPL	0	NRU	0	NZL	2	OMA	6	PAK	1	PHL	1	PNG	0	PNR	0	POL	0	POR	3	PRG	0	PRU	0
PSE	2	QAT	0	ROU	1	RRW	0	RUS	2	S	0	SDN	3	SEN	0	SEY	6	SLM	0	SLV	0	SMO	0
SMR	0	SNG	1	SOM	0	SRB	2	SRL	0	SSD	0	STP	0	SUI	2	SUR	0	SVK	5	SVN	2	SWZ	0
SYR	0	TCD	0	TGO	0	THA	0	тјк	0	ткм	0	TLS	0	TON	0	TRD	0	TUN	5	TUR	0	TUV	0
TZA	0	UAE	0	UGA	0	UKR	2	URG	0	USA	0	UZB	1	VCT	0	VEN	0	VTN	3	VUT	0	YEM	0
ZMB	2	ZWE	0																				

159 focal points notified by 62 Administrations

If focal point not notified  $\rightarrow$  BR will use official email addresses for notification services (BUT no myAdmin access then  $\bigotimes$ )





myAdmin

### Focal point only



### Mailbox: BR Output Channel

### Communication between the BR and the Member State

Notices under Review (GE06)

GE06D notices to be deleted in 30 days (in coordination since 2 years and 75 days): 49

·	ogle Earth   Generat records 49. Cli								Notices und	er conforr	nity	review	: 2		
<u>lm Id</u>	<u>BR Id</u>	Date of Receipt	Esport to Eno	el Google Ea er of recor					+ GE06D +	+ +					
Z/JAL/058	114088466	24 Jul 2014	Adm Id	BR Id	Adm	Intent	E PE	Sit	Export to Ex	cel Google	Earth	Genera	ite e-	-notices (Export	to SGML)
Z/JAL/059	114088467	24 Jul 2014	0001-0099	115154418	NOR	ADD	4	FOI	Total num	ber of rec	ords	2. Clic	k o	n headers t	o sort
Z/JAL/060	114088468	24 Jul 2014	0001-0100	115154416 116098510	NOR	ADD	4	SO	<u>Adm Id</u>	BR Id	Adm	Intent	PE	<u>Site/Allot</u> Name	<u>TV</u> Channel/Fr Block
			0001 0171	116098511	NOR	ADD			CNCCRTG24	116184059	GEO	ADD	3	DAMALA	9
			0001-0171	110090311	HOR	ADD	- 4	ÅFJ	GNCCDIGZI	110104055			-		
			0001-0171	110098511	HOR	ADD	4	AFJ	GNCCBT622					AKHALKALAKI	11
· · ·	ial Sections		x to the la	test BR I	FIC	(283	4) (	on o	GNCCBT622	116184060					11
· · ·	plan modificat	ions <b>t</b> e	x to the la	test BR I	FIC	(283 site O	4) (	on ( Y)	GNCCBT622	116184060	GEO		3	AKHALKALAKI	11
Your proposed	plan modificat	tions <b>t</b> o Specia	x to the la	test BR I	FIC	(283 site O	4) ( NLY	on ( Y)	GNCCBT622	116184060	GEO	ADD	3	AKHALKALAKI	11
Your proposed Plan	plan modificat	ions to Specia 1	x to the la b be publisi I Section	test BR I	FIC	(283 site O	4) ( NL) ibPa	on ( Y)	GNCCBT622	116184060	GEO	ADD	3	AKHALKALAKI	11
Your proposed Plan GE06 GE06	plan modificat	tions <b>t</b> o Specia 1	x to the la b be publish I Section 125 125	test BR   ned (Inter	FIC	(283 site O Pu	4) ( NL) bPa A1 B1	on ( Y) art	GNCCBT622	116184060 2016	GEO	ADD nber of 4	3	AKHALKALAKI	11
Your proposed Plan GE06 GE06	plan modificat	tions to Specia 1 1 1 1 1 1	x to the la b be publish I Section 125 125	test BR   ned (Inter	FIC	(283 site O Pu ed (II	4) ( NL) bPa A1 B1	on ( Y) art	GNCCBT622	116184060 2016	GEO	ADD nber of 4	3	AKHALKALAKI tices	11





**myAdmin** 

Focal point only



### Plans and MIFR statistics

GE84/F



Your own office for broadcasting services at the ITU (last update: 30 Nov 2016)

#### Adm(ITU) MailBox GE06D GE06A GE84 ST61 GE75 RJ81 MIFR

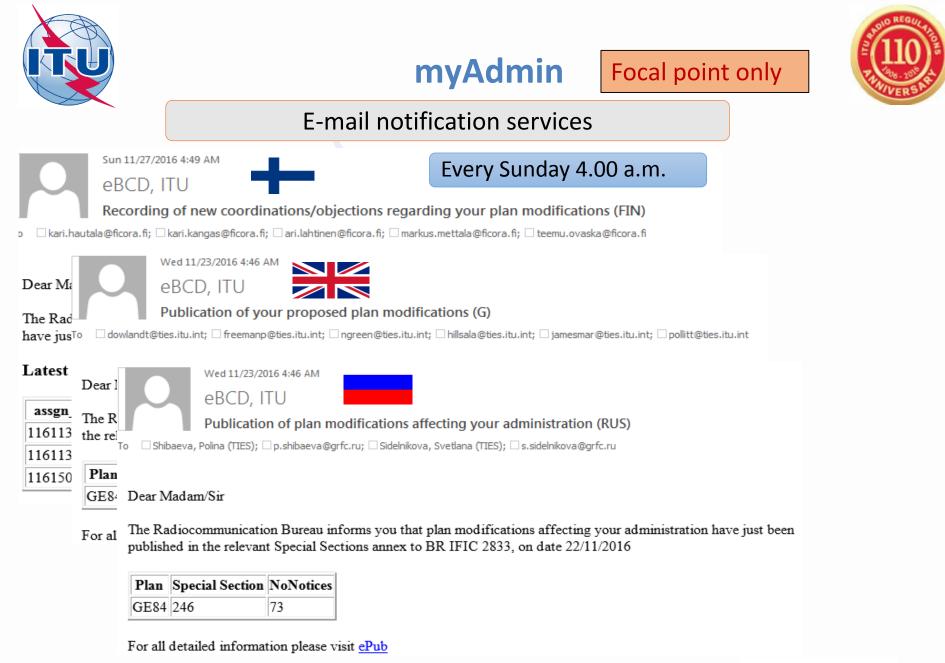
Recorded Assignments	<u>7513</u>
Notices under treatment	<u>85</u>
Notices under treatment ready for Part B	22
Notices under treatment receiving objection	<u>58</u>
Notices under treatment which affect me	<u>412</u>
Notices under treatment which affect me I objected to	<u>99</u>
Comments given in the last period (30 days)	<u>14</u>
Comments received in the last period (30 days)	<u>13</u>

Total num Export to Ex	_	of records 2 Google Earth	22. Click o Generate TE		ers to s	ort	
<u>BR Id</u>	<u>Adm</u>	<u>Site Name</u>	<u>Assigned</u> <u>Frequency</u>	<u>Intent</u>		<u>End Date</u> (Comments)	<u>Coord</u> <u>Completed</u>
<u>116103589</u>	F	POMMIERS	95.8	ADD	242		AUT BEL D E I LIE LUX MCO SUI
<u>116103588</u>	F	SAINTES BEAULIEU	105.3	MODIFY	242		EG
<u>116112427</u>	F	ISBERGUES	101.7	MODIFY	242		BEL D G HOL LUX SUI
<u>116112426</u>	F	LA FERTE BERNARD 2	95.8	MODIFY	242		AUT BEL D G HOL I LIE LUX SUI

#### GE84/Affected for F

Total num Export to Ex	_	of records 4 Google Earth	12. Click on h Generate e-notice				
<u>BR Id</u>	Adm	<u>Site Name</u>	<u>Assigned</u> <u>Frequency</u>	<u>Intent</u>	<u>Special</u> <u>Section</u>		<u>Coord</u> <u>Completed</u>
<u>116184619</u>	G	RHYL C	103.1	ADD	246	2 Mar 2017	
<u>116190417</u>	G	MANCHESTER HULME C	90.1	ADD	246	2 Mar 2017	
<u>116184631</u>	LUX	Luxembourg	103.4	ADD	246	2 Mar 2017	BEL D F G HOL SUI
<u>116184621</u>	SUI	MALIX BRAMBRUEES	CH 99.2	MODIFY	246	2 Mar 2017	AUT D F I LIE



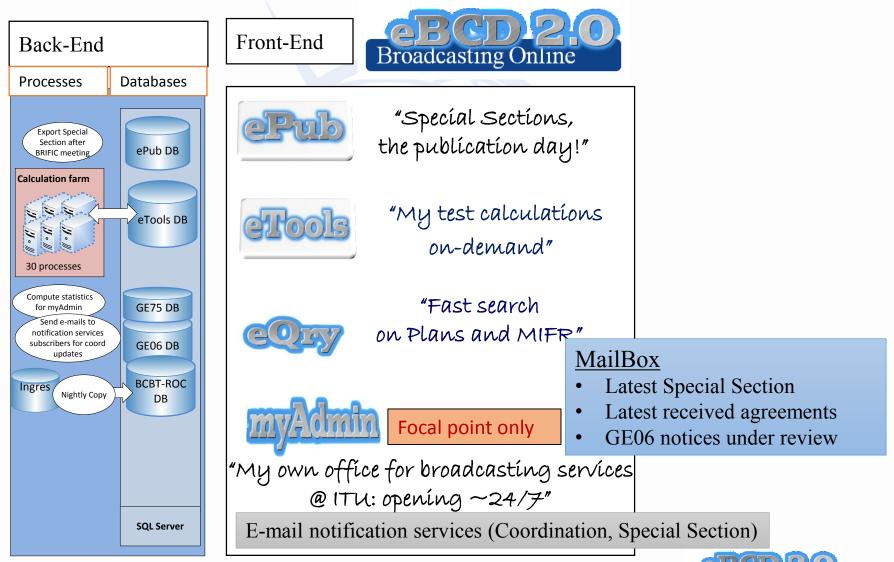








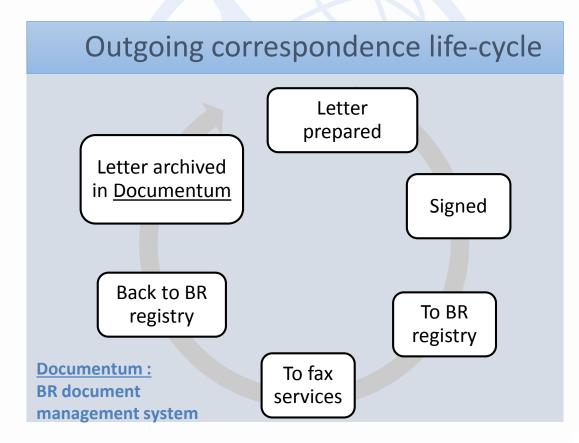
Broadcasting Online







**RRB request** (May 2016): letters and remainders (GE06 4.1.4.10) should be received by Administrations by **other electronic means** in addition to FAX

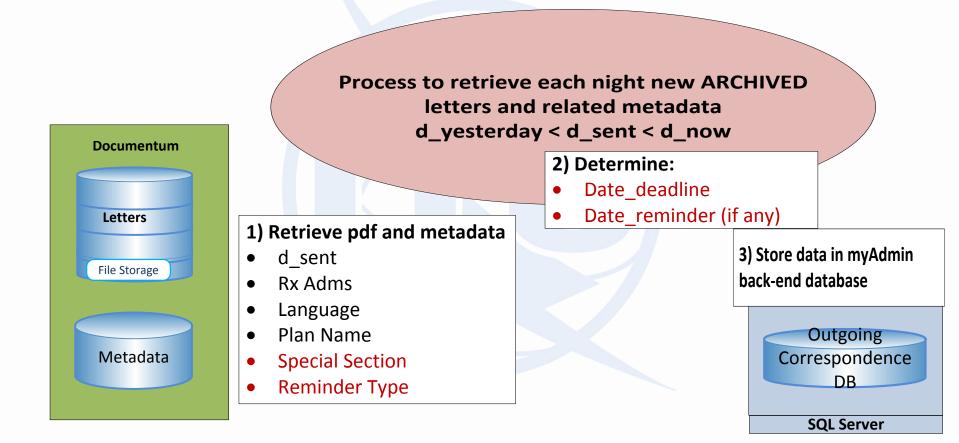






## eBCD2.0 platform: Documentum-myAdmin interface



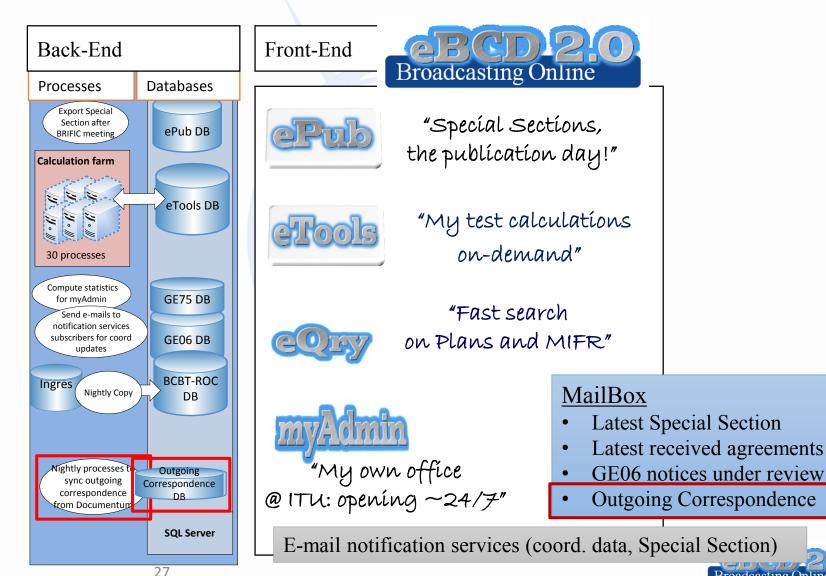








Broadcasting Online





## **BR outgoing correspondence dashboard**



#### **Outgoing Correspondence dashboard**

Select	Plan	Special Section	Lang	Reminder	Date_sent	Date_deadline	Date_reminder	Document	Not Ack	Ack	IsExposed	SrcUpdate
	GE84	242	s	GE84_70days_affected	19 Sep 2016	13 Oct 2016	25 Jul 2016	<u>0-2016-003473</u>	E		TRUE	fodetra
	GE84	244	s	GE84_0days_affected	28 Sep 2016	16 Nov 2016		0-2016-003654	E		TRUE	fodetra
1	GE06	97	Е	GE06_2y75days_earlywarn_notifier	29 Sep 2016	28 Dec 2016	18 Dec 2016	<u>0-2016-003680</u>	DNK		TRUE	castrojl
1	GE06	97	Е	GE06_2y75days_earlywarn_notifier	29 Sep 2016	28 Dec 2016	18 Dec 2016	<u>0-2016-003681</u>	KGZ		TRUE	castrojl
	GE06	97	Е	GE06_2y75days_earlywarn_notifier	29 Sep 2016	28 Dec 2016	18 Dec 2016	0-2016-003682	TUR		TRUE	castrojl
1	GE06	97	Е	GE06_2y75days_earlywarn_notifier	29 Sep 2016	28 Dec 2016	18 Dec 2016	<u>0-2016-003683</u>	UKR		TRUE	castrojl
	GE06	119	Е	GE06_4p1p4p10_affected	29 Sep 2016	8 Nov 2016	29 Oct 2016	<u>0-2016-003686</u>	G IRL		TRUE	manara
	GE06	119	F	GE06_4p1p4p10_affected	29 Sep 2016	8 Nov 2016	29 Oct 2016	<u>0-2016-003687</u>	BEL F		TRUE	manara
1	GE84	242	F	GE84_70days_affected	19 Sep 2016	13 Oct 2016	25 Jul 2016	0-2016-003471	AND BEL LUX TUN	ALG F	TRUE	fodetra
	GE84	242	Е	GE84_70days_affected	19 Sep 2016	13 Oct 2016	25 Jul 2016	<u>0-2016-003451</u>	AUT BLR CHN CZE D EST GRC HOL I KAZ LIE LTU MDA MNG POL S SVK SVN UKR UZB	FIN GEO LVA POR	TRUE	fodetra
1	GE06	120	Е	GE06_75days_notifier	3 Oct 2016			0-2016-003729	D		TRUE	manara
•	GE06	120	Е	GE06_75days_notifier	3 Oct 2016			0-2016-003737	NOR		TRUE	manara
1	GE06	120	Е	GE06_75days_notifier	3 Oct 2016			<u>0-2016-003738</u>	RUS		TRUE	manara
1	GE06	121	F	GE06_50days_affected	5 Oct 2016	30 Oct 2016		<u>0-2016-003785</u>	BEL		TRUE	manara
	GE06	119	E	GE06_4p1p4p10_notifier	29 Sep 2016			<u>0-2016-003688</u>	G		TRUE	manara
•	GE84	244	F	GE84_0days_affected	28 Sep 2016	16 Nov 2016		<u>0-2016-003652</u>	AND MCO TUN	BEL F LUX MRC SUI	TRUE	fodetra
	GE84	244	E	GE84_0days_affected	28 Sep 2016	16 Nov 2016		<u>0-2016-003646</u>	ALB ARM AUT AZE BIH CHN CZE D DNK GRC HNG HOL HRV I IRN KAZ LTU MDA MKD MNE MNG NOR POL RUS S SRB SVK TUR UKR		TRUE	fodetra
•	GE06	121	E	GE06_50days_affected	5 Oct 2016	30 Oct 2016		<u>0-2016-003763</u>	D DNK I LTU MAU RUS S	CZE G IRL NOR SVK	TRUE	manara
•	GE06	123	s	GE06_0days_affected	11 Oct 2016	25 Dec 2016		<u>0-2016-003886</u>	E		TRUE	castrojl
	GE06	123	Е	GE06_0days_affected	11 Oct 2016	25 Dec 2016		<u>0-2016-003880</u>	AUT CZE D DNK G HOL HRV I IRL NIG POL SVN	POR	TRUE	manara
	GE06	123	F	GE06_0days_affected	11 Oct 2016	25 Dec 2016		0-2016-003883	BEL MTN TCD	ALG F	TRUE	manara









### New E-mail notification services: Outgoing correspondence

		CC 014				
	on 11/14/2016 2:		€			
e	BCD, ITU		2			
Sp	pecial Section	n GE06/123 of BRIFIC	No 2830 dated Tuesd	lay, October 11,	2016 (ALG)	
				-	d, Hamza (TIES); 🗌 belaidhamza@gmail.	com
-		raoainene eginaireoniy 🗠 de	ingeleentaning in demojoe	sa eginameeniy 🗠 oela	ay named (120)) — belaki laned (ginam	-com
Castro, Juan L	uis					
ear Madam/S	ir					
n date Tuesda	ay, October 1	1, 2016 the Bureau ad	dressed you a corresp	ondence (Ref. No	.31B(BCD)O-2016-003883) c	oncerning the above-
entioned Spe	cial Section.					-
e Bureau wis	shes to inform	a you that this correspo	ondence is now availat	ole also in the Ma	ilbox section of the myAdmin	portal.
			2001	<u>A chan</u>	ta.	
		Your own off	fice for broadcasting se	ervices at the ITU	(last update: 30 Nov 2016)	
			ilBox GE06D G	GE06A GE84	GE89 GE75 MIFR	
		Adm(ITU) Ma	ilBox GE06D G	GE06A GE84	GE89 GE75 MIFR	
		Adm(ITU) Ma	ilBox GE06D G	GE06A GE84	GE89 GE75 MIFR	
¢	Welc	Adm(ITU) Ma	ilBox GE06D d	GE06A GE84	GE89 GE75 MIFR	
		ome user manara		GE06A GE84	GE89 GE75 MIFR	
				GE06A GE84	GE89 GE75 MIFR	
		ome user manara	ise)		GE89 GE75 MIFR	Number of days for comment/action
BR Ou	tgoing Corres Special	ome user manara pondence (BETA relea	ISE) nce Date Letter			
BR Ou	tgoing Corres Special Section	ome user manara pondence (BETA relea Corresponder	ISE) nce Date Letter tion 25 Oct 2016	Deadline	Document	comment/action
BR Our Plan GE84	tgoing Corres Special Section 245	ome user manara pondence (BETA relea Corresponder Publication of Special Secti	ISE) nce Date Letter tion 25 Oct 2016	Deadline 14 Dec 2016	Document 31E(BCD)0-2016-004155	comment/action 14





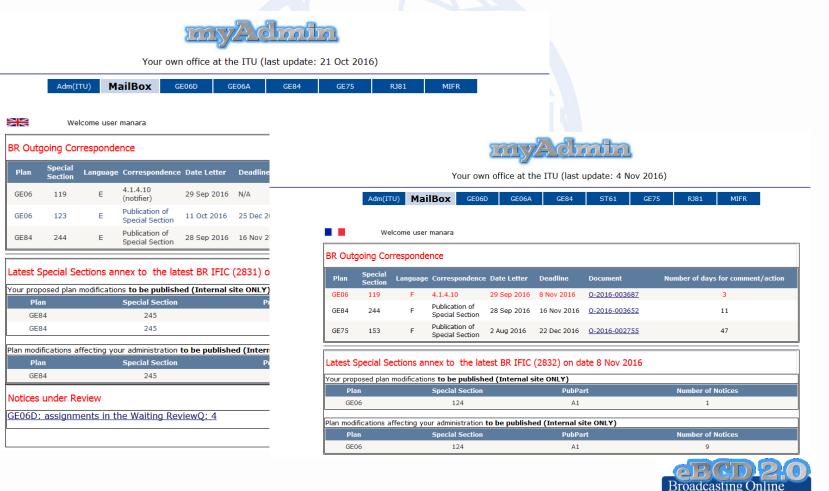
## myAdmin: viewing letters in MailBox



### Beta test since 14 November 2016 (58 letters (from 15 Sep. 2016) to 81 Administrations)

#### First week of beta testing:

39 focal points from 29 different administrations have been reading the pdf files





## **Online Validation**



Delivered prior to WRS-14 The <u>Online Validation</u> tool allows administrations to validate their notice file, before official submission via WISFAT

The processing system is currently **ONLINE** Contact: <u>brtpr dp@itu.int</u>

New Validation Logout

Refresh

Jobs History for user: manara

Test Packages 31412: click to show all

Job summary Delete

job id	job name	job status
31412	ugatest	Completed

#### Job Input

Adm	E-notice file	Number of Notices
UGA	<u>UGAtest.txt</u>	1

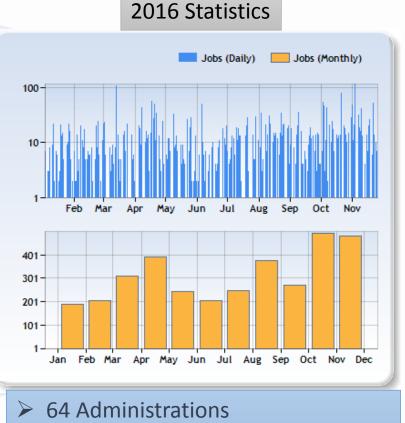
#### Job Output

Parse status: T\_PARSE\_HAS\_WARNINGS Total number of errors: 4 Total number of warnings: 1

#### Notice 1 (Line 4) - GT1/MODIFY

Line 4 : DeepVal Warning - Could not perform further notices validation checking, due to previous errors. Line 1 (4) : Error : Either t\_ref\_plan\_cfg OR t\_sys\_var & t\_rx\_mode should be submitted for this notice type Line 17 (20) : Error : t cef. plan.cfg : invalid value or make sure that the value is toned correctly.

Reuse TerRaNotice validation software, eTools functionalities in a SOA architecture

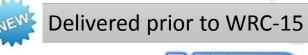


- ➢ 163 Users
- > 4500 Validation jobs



## eMIFR







MIFR (Terrestrial Services) on-line query (BETA release)

	MIFR (Broadcasting)	● MIFR (FXM) ◉ MIFR (all)	
	MIFR (ALL):	Selection Criteria	
Administration AFG AFS AGL ALB	Geographic Area ABW AFG AFS AGL	Notice Type           1A1         >           1A2         >           1A4         >>           1A4         >>	Class of Station AL FA FB FC AM BC BT BT
ALG ARG ARM ARS	AIA ALB ALG ALS	1A7 1B1 1C1 1Z0	FD FG FL FP
Status 🗹 Record	led 🛛 Pending		
Assigned Frequency MHz 🔻	f <sub>min</sub> f <sub>max</sub>	☐ f <sub>min</sub> ≤ Assigned Frequency	≤ f <sub>max</sub> only
Unique Id. code given by Adm	ininistration	Identifier assigned by the BR from	to
Date of Receipt (from)		Date of Receipt (to)	
Site Name			
TORINO			
	Apply Filter	Remove Filter	

#### MIFR (All)

Total number	of records :	10.	Click	on	headers to sort
Export to Excel	Google Earth				

BR Id	Adm	<u>Geo Area</u>	<u>Site Name</u>	Location	Assigned Frequency (MHz)	<u>Intent</u>
080015495	I	I	TORINO	007°44'00" E - 45°02'00" N	0.657	RECORDED
080225070	Ι	Ι	TORINO COLLINA	007°42'00" E - 45°06'00" N	212.5	RECORDED
080606153	Ι	Ι	TORINO COLLINA	007°40'00" E - 45°04'00" N	522	RECORDED
080607250	I	I	TORINO	007°44'00" E - 45°02'00" N	546	RECORDED
080608609	I	I	TORINO	007°39'00" E - 45°04'00" N	578	RECORDED
080610086	I	I	TORINO	007°44'00" E - 45°02'00" N	626	RECORDED
103046152	Ι	Ι	TORINO	007°44'00" E - 45°02'00" N	746	RECORDED
080623514	Ι	Ι	TORINO CASELLE	007°39'00" E - 45°11'00" N	1052	RECORDED
080623522	I	Ι	TORINO CASELLE	007°39'00" E - 45°12'00" N	1056	RECORDED
080623683	Ι	Ι	TORINO POIRINO	007°52'00" E - 44°55'00" N	1116	RECORDED

### <u>Query system</u> for the simultaneous retrieval of data from the terrestrial portion of the MIFR (FMTV, LFMF and FXM)

Emission Characteristics		
kssigned Frequency (MHz)     1052       keference (carrier) Frequency     Jass of Emission       Jass of Emission     PXX       andwidth Code     700K       Image: Station and Site Information     Image: Station and Site Information       Image: Operation 1     Image: Station 1		Nature of Service Frequency deviation (MHz) Energy dispersal (kHz) System Type Code(s)
General Characteristics	x	Polarization
Power to the Antenna (dBW) Radiated Power (dBW) Maximum Antenna Gain (dB) Maximum Gain Toward the Local Horizo Gain Type Maximum Power Density (dBW/Hz)	30 30 E	Antenna Directivity Azimuth of Maximum Radiation (°) Maximum Effective Antenna Height (m) Height of Antenna Above Ground Level (m) Elevation Angle (°) Beamwidth (°) Reference Antenna
Receiving Station Information		
RX1		Geographical Type CIRCLE
Site Name Geographic Area Region 1		Geographical type CIRCLE Zone ID Geographical coordinates 007°39'00" E - 45°11'00" N Radius (km) 80

BT BT AM AM



## **Online Tools survey**



# Please answer the 2016 <u>online survey</u> and help us improve our online service offer

### Survey WRS 2014

- 15 Jan- 1 Mar2014 → 73 users from 22 Member States
- 30% replies (240 users consulted eBCD 2.0 in that period)
- New requested functionalities evaluated and most voted implemented (see <u>Survey results</u>)





### **Conclusion and outlook:**

Towards a fully electronic BR for terrestrial services?



eBCD2.0 platform constantly improved and extended.

- SOA architecture, shows the flexibility of the system, which can be easily expanded to incorporate other online services.
- > New Online Tools for terrestrial services (Online Validation and eMIFR)
- The platform might serve as a basis for online access to different BR databases, publication, correspondence and calculations, providing administrations with added value services.
- Your e-feedback is important! Please answer the 2016 online survey

"Thanks for your attention!"

