European Schools
Office of the Secretary-General

European Baccalaureate Unit

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The on-line correction[1] of the European Baccalaureate written examination scripts

BOARD OF GOVERNORS OF THE EUROPEAN SCHOOLS

Meeting on 12, 13 and 14 April 2016 - Copenhagen

[1] On-line correction is often referred to as remote correction, distance correction, on-screen correction, etc.

Background

The Board of Governors held in the 1st – 3rd December 2015 in Brussels decided to endorse the following proposals in the document "Moving towards on-line correction of the European Baccalaureate written examination scripts" 2015-09-D-20-en-5

A) Abolition of the decision taken by the Board of Governors at its meeting in Brussels on 6-8 December 2011 which approved the following arrangement: *"The first marker and the second marker are teachers working in the European School system and external to the examination centre where the student is taking the Baccalaureate examinations",* since this practice has never been implemented and is contrary to all recommendations*.* Continue with the second correction being done by an external marker.

B) The principle of implementation of an online correction system as described in document "Moving towards on-line correction of the European Baccalaureate written examination scripts" 2015-09-D-20-en-5 (approved version) for the 2017 European Baccalaureate session, on the basis of cost neutrality in the long run.

The on-line correction system would stay a blended model with 1or 2 days' face-to-face meetings in decentralised correction centres. It would be supported by a suitable training scheme focusing on enhancement of the quality of assessment.

Organisational details of the project were presented at the February 2016 meetings of the Board of Inspectors Secondary and at the Joint Teaching Committee. Further organisational and financial details were submitted to the Budgetary Committee of March 2016.

1.- Basic technical specifications of the tool for the on-line correction

The on-line tool should have 3 **modules** automatically interconnected among them:

- Administration
- Scanning
- Correction

The interface must be user-friendly, multilingual (preferably EN, FR, DE) and with customized branded skins with the European School logo.
The corrector module must be web-based.
The administration and scanning modules/software must run on the Windows operating system. (Preferably not web-based). They must foresee compatibility with at least the three last versions of the operating system. They should be able to be updated alongside the updates of the operating system.
Web-based module(s) must run on most standard web browsers: Internet Explorer, Google Chrome, Safari, Firefox, etc. (Responsive interface)
Web-based module(s) must be compatible with all common operating systems in hand-held devices: Windows, Mac, Android… A dedicated appliance for each or a responsive interface.
For web based modules, it is preferred that no plug-ins or installation of other software is required. If so, no need to have administrative access on the computer to install the plug-ins.
For web based modules a secure and encrypted connection is required.
Access to modules/softwares must be password protected. Possibility to define a strategy for the passwords: complexity, lifetime, auto-blocking after several failures, recovery methods…
For the scanning and administration modules, integration in a larger work environment must be possible. (Files automatically renamed and stored in structured folders)
Sign-on compatible with the Active Directory of the European Schools.
Bi-directional communication with other systems in the European Schools working environment: SAP, BO, SMS… must be granted. Possibility to use Microsoft PowerBI or SAP Business Objects to produce statistics, dashboards, etc. would be an advantage. Read access to the data base.
Possibility of automated transfer of data between data bases and to receive all pdf files containing the results of the corrections in structured folders.
All modules must be provided of an interactive on-line training module and a help and troubleshooting query panel. High-level support for all users in case of troubles.

Data security
Data security will be a key issue.
Data (main servers, backup, tests, development servers...) must be stored in Europe and only in Europe.
The supplier must provide backup and high-availability (SLA).
The supplier (and all its sub-contractors) must be fully compliant with the European Regulation (data protection - European directive 95/46/CE).
Any transfer of data over a network must be done over an encrypted connection.
ISO 27001 certification is an advantage and it is required for the supplier of the servers.
The supplier must bind itself not to transfer the data outside of the European Union or to outsource any of the data to countries outside of the Europe Union.
The supplier must be registered with Office of the Information and Data Protection Commissioner
All sensitive data must be encrypted in the database.
Servers not shared with others customers is an advantage.

Audit
The system must include an auditing tool (User date, Location, IP addresses, Time and Date, Scope of change, Original Value, New Value,…). Also all log-in attempts, security events, systems errors must be logged and reported.

1.1 Scanning module

This module must be used in all European Schools and Accredited European Schools. It must be fully compatible with the choice of scanner made for all schools following the instructions of the European Schools IT Unit.

Scanning must allow different paper format up to A3. Duplex scanning in colour, high speed USB connexion. High speed processing.
The module must provide anonymization of the scripts.
The scanned scripts must be automatically compressed, labelled and stored by school, subject, first corrector, second corrector…
Upload to the secure main and backup server(s) must be made automatically with a secure and encrypted connexion.
Generated files must have a common standard format or be easily exportable (MS Word, PDF…)
This module must be error-free. The module must have scanning error detection and provide user-friendly troubleshooting.

1.2 Administration module

This module will be managed by the European Baccalaureate Unit. Through it, the European Baccalaureate Unit will be able to assign or define different roles and permissions for the use of the different modules.

This module must allow:

Creation of new users, Management of all users
Check-up of uploaded scripts
Control of absent candidates
Automated random allocation of external corrections
Manual allocation of external correctors
Automated or manual allocation of item-level correction
Automated or manual allocation of a third corrector (in the case of mark disagreement)
Customization of the correction parameters for each examination / items
Introduction of all reference elements for correctors: marking scheme and grid, correction criteria and guidelines and/or suggested answers.
Automated calculation of the final mark
Introduction of moderation parameters for a whole exam, one or several items. Automatic recalculation of marks.
Filter tool to apply modifications or moderations to examinations in a particular language section only, for example.

This module must also contain reporting and control tools:

Average mark per item
Average mark per examination
Deviation per exam / per item between first and second corrector
Standard deviation / deviation thresholds per item

Corrector performance report. Averages, deviation.
Automated alerts on deviation trends
Possibility of seeding
Possibility of mark validation.

This module must also offer:

Search tools with several criteria (year, subject, school, section, candidate name…)
Secure customizable and manageable communication tools (synchronous/ asynchronous)

1.3 Correction module

Must be web-based
Preferably html5 based, no need of installation of other software.
Secure connection and encryption
Possibility of use on hand-held devices on different operating systems: MS Windows, Android, Apple, etc. (Responsive interface)
User-friendly, multilingual interface
Contain all necessary reference documents at the reach of a click (assessment criteria, suggested answers…)
Follow-up of corrector performance: time invested to correct per paper, possible limitation of number of papers to correct per day…
Support all features of the correction model described in point 2 (below) in this paper.

2.- The new European Baccalaureate written examination correction model.

The proposed model will retain all the current elements contributing towards the quality of the assessment. The adoption of on-line correction tools will bring some advantages and improvements and contribute to enhance the transparency of our assessment processes.

These are some key features of the new model that will have to be supported by the on-line tools:

Scanning of the examination scripts
The scanning of the scripts must be made in each examination centre. The scripts will be compacted and uploaded automatically to a secure server with an encrypted connexion and any bandwidth. This means that the original paper scripts will be always in the possession of the school, thus eliminating the risks derived from the transportation of the scripts to the correction centre.

The scanning of the examination scripts will allow scripts to be available earlier for second correctors. This can have the following advantages:

- Extension of the correction period for second correction (now limited to 4 days)
- Possibility of reducing the number of external correctors (now necessary a larger number since the maximum number of papers that can be corrected in 4 days is 60)
- Wider choice of second correctors (now limited to those who can be freed from work in the middle of June and travel 4-5 days to Brussels).

Anonymity
Anonymity of the scripts will result in the unbiased assessment of candidates. This will be automated during the scanning process.

Criteria referenced
All examinations are accompanied by a marking scheme and grid, correction criteria and guidelines and/or suggested answers. These are known to the correctors and serve as a benchmark to assess the examinations and award marks.

The more concrete marking schemes and correction instructions are the more reliable the assessment becomes. Correctors will have all these elements integrated in the on-line tool. They will be available at all times during the on-line correction process at the reach of a click.

Multiple correction and marking: Internal / External
The on-line tools allow that the same script can be corrected by more than one corrector. In our system, every script is corrected twice. A third corrector can be involved if there is a mark disagreement of over 2 points between the two correctors.

Item-level correction and marking
On-line correction tools will also allow the possibility of different questions (items) in the same script being corrected by different correctors. This could be useful to allocate the more complex questions to correct to more experienced correctors.

Item level correction prevents correctors to be biased by the context, i.e. by the questions they have corrected in the same script.

Random allocation of the scripts
On-line correction tools will allow distributing evenly scripts from different schools to different correctors. Nowadays, so as to simplify the logistics, it is normally one corrector that corrects all the scripts from the same school.

Blind correction
On-line correction tools will allow scripts to have marking signs, symbols and comments without them being accessible to the second corrector, so that the second correction will remain unbiased.

However, all these elements will be accessible to the third corrector (in the cases of mark disagreement over 2 marks), the inspectorate and European Baccalaureate Unit. Those elements must also be easily transferable to the necessary parties in the case of an appeal, as foreseen in the Arrangements for Implementing the Regulations of the European Baccalaureate.

Mark agreement and calculation of the final mark
The on-line tool will take care that the following processes are automated:

The final mark will be the mathematical average of the marks awarded by both correctors.

If there is a difference of more than 2 marks between the marks awarded by the two correctors, a third corrector must be brought in. The third corrector will be selected automatically by the on-line tool. This will have to be validated by the inspector. Alternatively, the inspector will be able to decide on the appointment of the third corrector. The third corrector will be made aware of all marks and comments and s(he) will award a third mark that needs to be equal or between the highest and the lowest mark awarded by the first and second correctors. This will be the final mark.

Absence of transcription or addition errors
The on-line correction tool will alert the corrector when items have not been corrected or marked. Marks will be added automatically. Therefore, errors derived from transcription or addition of marks will be avoided.

Blended model
The first correction is carried out internally by the teacher of the candidate in the European Schools and the Accredited Schools.

The second correction is carried out by a corrector external to the European School system in a correction centre (European Schools) where 1 or 2 days' meetings will be organised between the inspectors and the external correctors in order to discuss correction guidelines and practice. Training and assistance on the use of the on-line tool will be provided.

The correction centre may be a single one or different correction centres. An example of decentralised correction centres is shown in Annex II.

After the face-to-face meetings, the correctors will continue their work remotely. The on-line tool will allow troubleshooting, a help line and secure communication with the inspectorate and the staff in charge of giving assistance and support.

Retrieving evidence and accessibility to corrected scripts
Corrected scripts would be easily accessible since they would be stored in a secured server accessible anytime from anywhere. This would also eliminate the difficulty of retrieving documents in case of appeals and especially during periods where many members of the staff in the schools are on holidays.

Correctors training
The on-line correction tools must be easy to use. There must be an on-line tutorial and a help-line. The electronic tools be web-based so that no software needs to be installed in the correctors' own computers.

In a blended system, face-to-face training will be foreseen for internal and external correctors. Assistance for correctors and short refresher trainings will be provided each session.

Corrector's assessment
The on-line tools will be able to inform on correctors' performance. Analysis of standard deviation on the corrected items or papers must be possible.

The use of seeding or validation will be possible, especially for new correctors.

Secure communication
On-line tools have secure communication channels so that the inspectors responsible for a subject can communicate (synchronous and asynchronous) with the correctors.

Inspectors will be able to release special instructions or recommendations for correction on account of the relevance of possible issues reported during the examination proceedings.

Possibility of moderation
The on-line tool will allow automated recalculation of values either for the whole examination or for individual questions as a result of the modification of values in the different questions of an examination or due to the cancellation of one or several questions.

Monitoring of the correction process
On-line correction tools must allow monitoring and validation of the correction process. They will provide immediate access to statistics on performance.

Marks transfer to SMS
The on-line tool will offer the possibility of automated transfer of marks to the School Management System in use.

3.- Implementation plan

Periods	Steps	Who?
Research July 2015 October 2015	Identification of possible suppliers / Visits Contacts with organisations using on-line correction and marking tools (IBO, AEFE…) Reviewing literature	BAC Unit / IT Unit
Agreeing on the principle of on-line correction Meetings Autumn 2015	Submission of a paper exploring the convenience of on-line correction: 2015-09-D-20-en-1 Moving towards the on-line correction of the European Baccalaureate written examination scripts Discussion	BIS (opinion), JTC (info), BC (opinion), BoG (adoption)
Providing further information Meetings February/ March 2016	Submission of paper 2016-01-D-31-en The on-line correction of the European Baccalaureate written examination scripts	BIS (opinion), JTC (opinion), BC (approval)
Call for tender April /May 2016	Submission of paper 2016-01-D-31-en The on-line correction of the European Baccalaureate written examination scripts Publication of a call for tender document	BoG (approval) OSGES
Purchasing August 2016 October 2016	Choice of tools Purchasing operations / Contracts Acquisition of on-line tools Acquisition of the equipment (scanners…)	OSGES OSGES OSGES Schools
Planning and Organisation October 2016 December 2016	Integration of tools Identification of main participants in process in each centre (responsible members of staff and back-up for scanning and uploading process) Presentation and delivery of process to key stakeholders and training of referents (teachers / administrative staff / external correctors) Training of administrators (scanning, online-marking setup and management)	Supplier / IT Unit Schools Supplier / BAC and IT Unit Supplier
Deployment and training January 2017 June 2017	Initialization of system for training in centres and for test sessions Insertion of administrative elements (subjects, candidates, examiners, mark schemes...) Insertion of information for correctors (correction instructions) Transfer of login information to examiners and supervisors Setup and training for scanning personnel at schools Training of examiners and inspectors Test and validation of scanning centres Test sessions in exam centres	Supplier / BAC Unit BAC Unit / IT Unit / Supplier IT Unit Supplier / BAC Unit Supplier / BAC Unit Supplier Supplier Schools / Supplier / BAC Unit

Periods	Steps	Who?
Operations June 2017 July 2017	Insertion of information for correctors. Moderation. Scanning and transfer of scripts onto platform Online marking and monitoring of digitized scripts Organization of final validation process Extraction of test results and archives	Inspectors / BAC Unit Centres Correctors Inspectors / BAC Unit Supplier / IT Unit / BAC Unit

3.1.- Special transitory measure for European Baccalaureate 2017 to avoid risks.

For the first European Baccalaureate session (2017) to be corrected with the on-line tool both correction systems, i.e., the traditional one and the new on-line correction system could overlap and run at the same time if problems happened.

Scripts will be scanned at each school right after the end of each examination. They will be assigned immediately to the external correctors who may start correction immediately at a distance. Should any problem occur with the online correction tool, the paper scripts will then be sent by post to the correction centre(s) so as to assure that correction could still happen on the paper scripts at the correction centre(s). A maximum of 4 days may be still allocated to attend the correction centre(s) depending on the number of scripts to correct. Correction will be finalised and validated at the correction centre(s) following the instructions of the inspectors.

4.- Training.

4.1.- Office of the Secretary General

The designated members of the IT Unit at the Office of the Secretary General will receive a comprehensive training so that:

- they may perform second level escalation troubleshooting, installation, configuration and maintenance tasks.
- they may introduce the new tool in the IT environment of the European Schools and verify the correct exchange of data with the other applications in the IT environment of the European Schools

The members of the European Baccalaureate Unit will receive a comprehensive training on all modules with a special focus on the administration module.

The supplier will assist the European Baccalaureate Unit with the customization of all necessary roles, parameters, etc. and with the transfer and introduction of the necessary data. These operations and training will take place from October to December 2016.

In January 2017 a mock exercise with Pre-Baccalaureate examinations will take place.

During the European Baccalaureate session 2017, the supplier will assist the European Baccalaureate Unit in all necessary tasks. The supplier will appoint a project manager to coordinate all implementation tasks and to assure success.

4.2.- Administrative staff at the schools.

Administrative staff at the schools are mainly concerned with the scanning and uploading of the scripts.

The supplier will assure the training of the users. The supplier must prepare a comprehensive manual, an on-line training tool and dispose of a help-line to be used as second level of escalation for trouble-shooting all this at least in 2 of the following languages (EN, FR, DE).

The supplier will give the schools' IT departments all necessary information and training on the technical details so that they may act as first escalation level for assistance and troubleshooting.

The scanning trainings will take place in the schools using their equipment. Schools in the same city or close by may be grouped together for the training actions. This part of the training should happen in December 2016 / early January 2017.

In January 2017 a mock exercise with Pre-Baccalaureate examinations will take place.

4.3.- The inspectorate

The inspectors will receive all necessary training on the correction module. They will have a different role from the correctors since they will be allowed moderation capacities. They will also receive a basic overview of the administration module in regards to the parameters for which they may decide to request customization.

The correction module will be provided of an on-line training tool. Around the Board of Inspectors Secondary of October and/or February there will be specific training actions for inspectors in Brussels.

4.4..- The teachers

The teachers will be able to access an on-line training module.

During the correction of the Pre-Baccalaureate examinations a mock exercise will be organised which will serve as hands-on training. These training actions will take place in the schools. Schools in the same city or close by may be grouped together for the training actions.

During the Baccalaureate examinations the European Baccalaureate Unit and the supplier will assure assistance to the teachers.

4.5.- The external examiners.

The external examiners will be able to access an on-line training module. They may also participate in the Pre-Baccalaureate mock exercise.

During the Baccalaureate examinations they will be trained and assisted at the correction centres by the supplier and the European Baccalaureate Unit.

5.- Support

The IT Unit will manage all issues linked with the European School's IT infrastructure (network, hardware, software):

- Installation of software
- Desktop, scanners
- Network
- …

At each School:

- Local IT services will be the support for the IT infrastructure (Network, Hardware and installation of the software)
- BAC Super Key User will be the support for the local correctors and the interface between teachers and the European Baccalaureate Unit.

At the Office of the Secretary General:

- The IT Unit will manage all IT infrastructure and collaborate with each local IT team.
- The IT Unit will collaborate with the provider to install the software & updates
- The IT Unit will support the European Baccalaureate Unit to establish and provide process protocols and guidelines…
- The European Baccalaureate Unit will support all inspectors and external correctors
- The European Baccalaureate Unit will manage all change requests, test the changes and validate them, with the support of the IT Unit.

The supplier will assist, support and troubleshoot at all levels.

5.1.- Temporary Support officer

The Office of the Secretary General will engage temporarily a support officer to assist with the implementation during the first European Baccalaureate session. The estimated period will be January to June 2017.

6.- Cost estimation of the implementation of on line correction

The market research carried out indicates that starting up this project would entail the following range of costs depending on the supplier(s) chosen:

Scanners
Scanning recto/verso, different standard sizes (A3, A4) …
Prices range between €3.200 - €8.000 per examination centre.
The IT Unit will instruct the schools on the purchase procedure and the most suitable options depending on the number of copies that each school has to scan per session
Schools are strongly recommended to purchase a back-up scanner
The cost for purchasing scanners will be engaged by each examination centre.
Approximate life-span of scanners around 10 years.

Temporary Support officer (6 months: January-June 2017)
This may have an estimated cost of around € 40.000

On-line tools.
Yearly subscription to services including the use of the platform, basic set-up and check-up operations, hosting, hosting management, technical assistance, fee per processed script…

		Maximum
Subscription	€30.000	€40.000
Cost per script X 10.000 scripts	€20.000	

Number of scripts is calculated, approximate number of candidates multiplied by 5 written examinations.

€2 processing fee per script is a maximum price.

Subscription cost and processing price per script will be important award criteria.

Project management
Setting up of all first year operations
Assistance with planning and implementation

First year

	Days	**Price**
Minimum	14	€16.800
Maximum	20	€24.000

Second year

	Days	**Price**
Maximum	10	€12.000

Following years

Days	**Price**
5	€6.000

Project management rate is calculated at €1.200 / day for on-site actions. This covers travel, accommodation, subsistence and all other expenses.

Training

	First year	Second year	Following years
Training administration BAC Unit	5 days €6.000	5 days €6.000	5 days €6.000
Training scanning	20 days €24.000	10 days (20 half days) €12.000	**---**
Training inspectors	10 days €12.000	5 days €6.000	2 days €2.400
Training external correctors	10 days €12.000	5 days €6.000	2 days €2.400
Training teachers	20 days €24.000	10 days (20 half days) €12.000	**---**
Total:	**€78.000**	**€42.000**	**€10.800**

Training rate is calculated at €1.200 / day for on-site actions. This covers travel, accommodation, subsistence and all other expenses.

Training for the first and second year bears an stronger focus on technical aspects of the use of the tool. Training in following years bear an stronger focus on quality assurance of assessment.

Overall cost

First year

		Maximum
Support officer	€40.000	€40.000
Subscription	€30.000	€40.000
Scripts	€20.000	€20.000
Project management	€16.800	€24.000
Training	€78.000	€78.000
	€184.800	**€206.000**

Second year

		Maximum
Support officer	**--**	**--**
Subscription	€30.000	€40.000
Scripts	€20.000	€20.000
Project management	€12.000	€12.000
Training	€42.000	€42.000
	€104.000	**€114.000**

Following years

		Maximum
Support officer	**--**	**--**
Subscription	€30.000	€40.000
Scripts	€20.000	€20.000
Project management	€6.000	€6.000
Training	€10.800	€10.800
	€66.800	**€76.800**

Cost neutrality

	Minimum cost	Maximum cost
1st year	€184.800	€206.000
2nd year	€104.000	€114.000
3rd year	€66.800	€76.800
4th year	€66.800	€76.800
	€424.400	**€469.600**

Currently the cost of the correction of the examinations is around €320.000 out of which approximately two thirds are for travel and daily allowances (accommodation, subsistence…) By having a blended and decentralised model, we estimate that those expenses can be cut by approximately half. Therefore, we expect savings of around €100.000 per year, which means that the project would be cost neutral between years 4 and 6.

7.- Compensation of external examiners

Nowadays, the compensation of external examiners is calculated by a day of work. The daily allowance was established at €148.74. The number of scripts to correct per day is 12 for Language 1, Language 1 Advanced, Language 2, Language 2 Advanced and Philosophy. This same number applies when an external examiner corrects 2 different scientific subjects (Mathematics, Physics, Biology, Chemistry and Economics).

For the rest of the cases the number of scripts to correct per day is 15. 1 Music portfolio equals 1 script.

This rate has remained unchanged since 2001 but, despite that, it is still competitive if we compare it with the rates paid to correct high-stakes (secondary leaving certificate) examinations in international organisations or national systems.

Therefore, based on the current rate, we propose to establish for the European Baccalaureate session 2017 the following fees per corrected paper:

€12.5 for cases where the number of scripts to correct per day is 12
€10 for cases where the number of scripts to correct per day is 15

Based on the total amount for correction for European Baccalaureate session 2016 would be:

4.006 scripts x €12.5 = €50.075
5.485 scripts x €10 = €54.820
Total= **€115.025**

On a blended model the external correctors will be invited to a face-to-face meeting at the correction centre(s) with the inspectorate. The focus of those meetings will be training and quality assurance of assessment. Travel and the established daily subsistence expenses for the days they are invited to attend will be covered at the established rate of €175.80. This will be the only allowance paid for face-to-face meetings.

9.- Remote correction

Remote correction through the Learning Gateway has been happening since 2009. Subjects with a number of scripts to correct smaller than 15 or only with a single corrector can be fully corrected at a distance without the need of a face-to-face meeting.

The minimum compensation paid will equal the daily allowance established at €148.74.

10.- Inspectors' dedication

Inspectors will be allocated a maximum of 4 days to monitor on-line correction, depending on the number of scripts they are responsible for. These days will be immediately after the Board of Inspectors in June. From these 4 days, a maximum of 2 days will be used for the face-to-face meetings with the external corrector, the other 2 days for remote consultations.

Opinion of the Board of Inspectors

The BIS expressed a favourable opinion about the implementation plan proposed in the paper. Some concerns were expressed regarding two issues

a)the possible increase in the Inspectors' workload and availability

b)the possible loss of expertise if some of the currently engaged correctors declined to collaborate

The inspectors were reassured that the concerns expressed above would be taken into consideration and dealt with accordingly.

Opinion of the Joint Teaching Committee

The Joint Teaching Committee expressed a favourable opinion on the implementation plan proposed in the paper. Interparents were concerned that problems during the correction phase could lead to late delivery of the European Baccalaureate marks. The teachers also expressed some concerns relating to the training required to be able to make efficient use of the tool. Both parents and teachers proposed that if any problems arose during the implementation timeframe, the roll-out phase of the project might be postponed until the 2018 European Baccalaureate session.

The Joint Teaching Committee was reassured that all necessary efforts would be made to implement the project, avoiding all risks, especially the late delivery of marks. Indeed, if the timeframe could not be adhered to safely, the project's roll-out could be postponed until the 2018 European Baccalaureate session.

Opinion of the Budgetary Committee

The Budgetary Committee scrutinized and approved the document 2016-01-D-31-en-2.

Proposal to the Board of Governors

The Board of Governors is requested to scrutinize the present document (**2016-01-D-31-en-3**) and to approve it.

Annex I

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Annex II
Example of decentralised correction centres

This is only a simulation of how decentralised correction could be organised for Baccalaureate session 2017. All correction centres would be European Schools. The correctors already performing distance correction would continue correcting from home.

	9 Correction Centres	Estimation of number of correctors per centre
1	ALICANTE	8
2	BRUSSELS 1	40
3	BRUSSELS 2	32
4	BRUSSELS 3	32
5	BRUSSELS 4	46
6	FRANKFURT or any other school in Germany	14
7	MOL or BERGEN	9
8	VARESE	8
9	DISTANCE CORRECTION (from home)	33
TOTAL		**222**

Each inspector responsible for a subject would be assigned to a correction centre, where the external correctors would attend depending also on the subjects. Subjects, external correctors and inspectors responsible for a subject are assigned to a correction centre based on the principle of efficiency. For example, in the European School of Alicante we would have all external correctors dealing with all levels of Spanish language and the inspector responsible for Spanish. Art in Spanish would continue being corrected in Alicante, as that has been the case already for a number of years.

In 6 and 7 in the table above, the choice of correction centre would be made by considering the same principle of efficiency and with the agreement of the inspector(s) responsible for subjects assigned to those correction centres.

In Brussels, we have made a distribution in 4 schools, but it would be also possible to group correction centres, even maintain Brussels I as a central correction centre.

In the following table we show a simulation of a possible distribution of subjects in correction centres (based on the 2015 baccalaureate session situation).

Correction centres	Subject	LANGUAGES	Number of Correctors	TOTAL number of Correctors
ALICANTE	ART	ES	1	**8**
	L1-		2	
	L1-L2		1	
	L3-L4		4	
BRUSSELS 1	ART	DE, EN, FR	4	**40**
	L1-	DA, EL, EN, FI, PL, SV	8	
	L1-L1 ADV		4	
	L1-L2-L4		1	
	L1-L3-L4		1	
	L2-		13	
	L2 ADVANCED		1	
	L2-L2 ADV		3	
	L2-L3		1	
	L3-		4	
BRUSSELS 2	BIOLOGY 4P	ALL	10	**32**
	CHEMISTRY		12	
	HISTORY 4P	DE, EN, FR	8	
	L1-	PT	1	
	L1-L3-L4		1	
BRUSSELS 3	ECONOMICS	ALL	6	**32**
	GEOGRAPHY 4P	DE, EN, FR	6	
	L1-	BG, FR	9	
	L1-L1 ADV	FR	1	
	L2-		7	
	L2 ADVANCED-L3		1	
	L2-L3		1	
	L3-L4		1	
BRUSSELS 4	MATHS 3P	ALL	4	**46**
	MATHS 3P & 5P		27	
	MATHS 3P & 5P & PHYSICS		2	
	MATHS 5P		2	
	PHYSICS		11	
FRANKFURT or any other ES in Germany	L1-	DE	5	**14**
	L1-L1 ADV		1	
	L2-		5	
	L2 ADVANCED-L3-L4		1	
	L3-L4		1	
	MUSIC 4P	DE, EN	1	

Correction centres	Subject	LANGUAGES	Number of Correctors	TOTAL number of Correctors
MOL or BERGEN	L1-	NL	2	**9**
	L1-L2		1	
	L3-L4		1	
	PHILOSOPHY 4P	EL, EN, FR, IT	**5**	
VARESE	ART	IT	1	**8**
	L1-		4	
	L1-L1 ADV		1	
	L1-L2-L3		1	
	L4-		1	
DISTANCE CORRECTION	ANCIENT GREEK	EL	1	**33**
	BIOLOGY 4P	EL, ES, FI, HU, PL, PT, SV	7	
	CHEMISTRY	PL	1	
	ECONOMICS	IT, NL	2	
	L1-	CS, ET, HR, LT, LV, RO, SK, SL	9	
	L3-	FI	1	
	LATIN	DE, NL	2	
	MUSIC 4P	DE, EN	1	
	ONL	SV	1	
	PHILOSOPHY 4P	DA, DE, ES, FI	4	
	PHYSICS	EL, ES, FI, PL	4	
			TOTAL	**222**