



ADB

Good Practice in the Preparation of Contract Documents

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Pactus sunt servanda – Agreements must be kept

- But:
 - the Contract cannot override mandatory laws in the Country of the Works; and
 - the contract is to be interpreted in accordance with the Governing Law.
- FIDIC definition of *"laws"*:
 - *"all national (or state) legislation, statutes, ordinances and other laws, regulations and by-laws of any legally constituted public authorities."*
- FIDIC provision regarding *"governing law"*:
 - *"The Contract shall be governed by the law of the country or other jurisdiction stated in the Appendix to Tender/ Contract Data."*

- In some cases, the provisions of FIDIC contracts might be interpreted differently according to the law which governs.
- In other cases, the governing law and/or the law of the Country might impose requirements that are different from or additional to FIDIC requirements.

Subcontractors

- One of ADB's guiding principles is to encourage development of a domestic contracting industry in the country of the borrower.
- Such encouragement can be through the application of a "domestic preference" weighting during bid evaluation – but actual award of the subcontracts to local companies must be "policed" and covered by a guarantee.
- It can also be through the imposition of a "threshold" fixing the minimum amount which must be subcontracted locally (sum of all subcontracts).

Commencement, Sections, Milestones, Acceleration & Delay Damages

- Most FIDIC contracts require the Engineer / Employer / Employer's Representative to give the Contractor not less than 7 [14] days' notice of the Commencement Date.
- The Pink Book and the 2017 ADB COPA lists conditions precedent that must be fulfilled prior to the Commencement Date, including:
 - a) Signature of the Contract Agreement and approval by relevant authorities of the Country;
 - b) Delivery of reasonable evidence of the Employer's financial arrangements;
 - c) Effective access to and possession of the Site together with permits for commencement;
 - d) Receipt of the Advance Payment provided that the corresponding bank guarantee has been provided.

- Under the Pink Book, if all 4 conditions are not satisfied within 180 days after the Letter of Acceptance, the Contractor may terminate.
- There is no longstop date like this in the 2017 ADB COPA.
- The Pink Book required the Contractor agree that the conditions have been fulfilled. In the 2017 ADB COPA, the Engineer determines if the conditions have been fulfilled.
- In the 2017 COPA there is a 14 day notice.
- Items a), c) & d) are all known to be common sources of problems.
- If so, how can the wording be improved?

- FIDIC contracts provide for sectional completion – provided the Sections are described in the Contract.
- Each Section has its own Time for Completion, its own Taking Over Certificate, its own Defects Notification Period and its own delay damages.
- What traps must the drafter avoid?
 - The geographical limits of the Section must be carefully described, with the above characteristics in mind.
 - Once completed, a TOC must be issued and the DNP begins – this might not be the intention.
 - If the Employer begins using the Section before a TOC is issued, the Section is deemed to be Taken Over.
 - The basis for deciding on the value of delay damages

- For example, a contract for Civil Works for a power station may have a Section which involves foundations for a steam turbine. The foundations must be completed in time to match the Mechanical Works contractor's installation programme.
- When are the foundations considered to be complete:
 - When the Civil Works Contractor hands over the first foundation, complete with anchor bolts fixed in position and concrete of required strength?
 - When he hands over the last foundation, complete with anchor bolts and concrete of required strength?
 - When he begins fixing anchor bolts under instruction from Mechanical Works Contractor?
 - When the Mechanical Works Contractor begins installation?

Price Adjustment

- ADB requires price adjustment provisions in contracts with long delivery or completion periods (>18 months) including major civil works contracts.
- This is in line with aim of having a balanced allocation of risks and liabilities.
- Without such a provision, Contractor would have to build allowance in to his tender – and Employer would have to pay even if actual cost increases were less than expected.
- If Contractor did not allow enough, he might run out of funds and stop work.

- FIDIC contracts provide for adjustments.
- Red, Pink & Yellow Books contain a suggested formula:

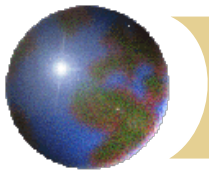
$$P_n = a + b L_n/L_o + c E_n/E_o + d M_n/M_o + \dots$$

- Applicable if relevant information is given in "Table of Adjustment Data"/ "Schedule(s) of cost indexation" (2017).
- Gold Book provides for adjustments based on a "Schedule of cost indexation" (if any).
- Silver Book allow adjustments if provision included in Particular Conditions.

- The use of the suggested formula does not guarantee that Contractor will be fully compensated or that he will not be over-compensated.
- Much depends upon:
 - the choice of cost elements to be taken into account under "M" – diesel, cement, steel, etc.;
 - the weighting of the non-adjustable portion "a" – FIDIC fixes this at 0.10 but a different weighting can be given in the Particular Conditions or Table of Adjustment Data;
 - the weighting applied to the other cost elements – "b", "c" & "d";
 - the source and reliability of indices;
 - the timing of cost increases.

- The price adjustment provisions can be modified by the Particular Conditions.
- Common modifications include:
 - the weighting of the non-adjustable portion “a” is increased;
 - no adjustment for first year (but what happens if Contractor makes insufficient progress?);
 - no adjustment for first 50% of Works;
 - no adjustment until “Pn” exceeds 1.10 (first 10% increase is Contractor’s risk).
- The consequence of all of these modifications will be an increase in bid prices – unless short term cost increases are believed to be unlikely, in which case, what is the benefit of modification to Employer?

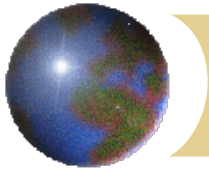
- What can go wrong?:
 - The indices do not reflect reality;
 - An index stops being published or never in fact existed
 - In the absence of published indices, bidder proposes to use “market rates” – but “base prices” are understated and/or “market rates” are based on questionable evidence;
 - As the formula is independent of time, Contractor might buy high-risk items long before they are needed in order to maximise recovery – (linked to Advance Payment provisions and Advances for Material on Site).



Tender Package and Contract Production

The Employer's Design Consultants

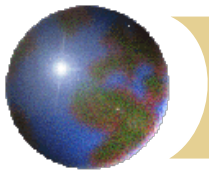
- Ideally they should draw up a set of plans and write project specifications
- Typically they take shortcuts
- They will “assemble” a package from older specifications from previous projects and include “design guides” and standard specifications without reviewing them
- Employers with their own design staff often do the same
- In addition they may well write a “scope of works” to try to resume everything
- The result is a contractor may have to look in 4 or 5 places to figure out what his real scope is
- Problems of blurred lines of design responsibility will be treated later



Tender Package and Contract Production

The Employer's Lawyers

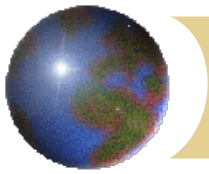
- The employer's lawyers are supposed to write a set of general conditions and perhaps help with any special conditions of contract
- The lawyers will almost always anticipate project management issues in these conditions
- The lawyers are very likely to write about such issues as:
 - Submittal procedures
 - Design development
 - Materials and substitution
 - Quality
 - Scope (The Works)
 - Order of precedence
 - Price
 - Programme
 - Liquidated Damages
 - Site access
 - Warranty
- These same topics are too often also covered (in a vacuum) by the design consultants and/or the construction manager



Tender Package and Contract Production

Problems when the Employer's team uses this approach

- The problems are obvious
- Often times the lawyers set up a framework that is left open for completion by the designers or engineer
- The engineer and the designers may never read the lawyer's general conditions
- Liquidated Damages are a classic situation, but issues as mundane as weather can be mishandled this way also
- Most of the problem comes from the fact that subjects are being covered three times by three separate teams each working in a vacuum and each with their own interests at heart and each thinking the other is "too incompetent to have thought about writing on this particular aspect"
- However even within the design consultant's documents, the "kitchen sink" approach is going to create problems

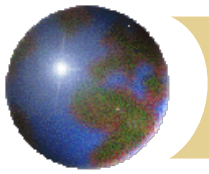


Tender Package and Contract Production

References in FIDIC to Specifications or Drawings

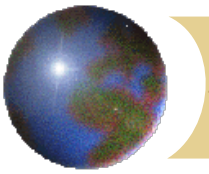
- | | | | |
|------|--|-------|---------------------------------|
| 1.8 | Care and Supply of Documents | 6.1 | Engagement of Staff and Labour |
| 1.13 | Compliance with Laws | 6.6 | Facilities for Staff and Labour |
| 2.1 | Right of Access to the Site | 6.7 | Health and Safety of Personnel |
| 2.5 | Site Data and Items of Reference | 6.12 | Key Personnel |
| 2.6 | Employer-Supplied Materials and Employer's Equipment | 7.3 | Inspection |
| 4.1 | Contractor's General Obligations | 7.4 | Testing by the Contractor |
| 4.4 | Contractor's Documents | 7.8 | Royalties |
| 4.5 | Training | 8.3 | Programme |
| 4.6 | Co-operation | 9.1 | Contractor's Obligations |
| 4.8 | Health and Safety Obligations | 10.2 | Taking Over Parts |
| 4.9 | Quality Management and Compliance Verification Systems | 11.11 | Clearance of Site. |
| 4.16 | Transport of Goods | | |
| 4.18 | Protection of the Environment | | |
| 4.19 | Temporary Utilities | | |
| 4.20 | Progress Reports | | |
| 5.2 | Nominated Subcontractors | | |

Plus other matters such as Sub-
Clause 7.2 [*Samples*]



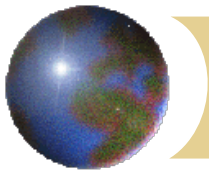
Contract « Assembly »

- Common errors happen between the submission of tenders and drafting the final contract
- What the employer puts out as the tender package, what the contractor offers and what is finally negotiated can involve a substantial transformation of the original tender documentation
- There are several methods used by employers:
 - The “Bind Everything Ever Written by the Parties in Connection with the Tender and Negotiations into the Contract in Chronological Order” method
 - Update the tender documents, or
 - The “Integrated Contract” method



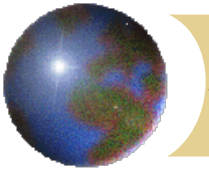
(*“Everything In” method*)

- Many employers/consultants want to “preserve” the history of the tender and contract discussions and negotiations
- They think they are achieving this by insisting that every letter, email, meeting minute and question/answer be made a contractual document
- These documents may be physically bound into the contract documents
- Or even worse - included by simple reference



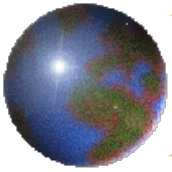
(“*everything in*” method)

- This method can be a disaster
- Much of the correspondence is not written with the intent of being a contract document and is therefore sloppy
- The style is often staccato and frequently a third person can't understand what the subject is. Often the drafters two years later can't tell you what the subject is
- Following this paper trail over the many months often involved in big tenders and negotiations is a nightmare to administer as a contract
- A room might be blue in the tender, green in an addendum, red in a following question and answer document, and yellow in a post-tender clarification meeting.
- How do you deal with an order of precedence this way? I don't know
- Issues are often not addressed head-on in these types of correspondence
- Written responses to questions are often ambiguous and frequently unsatisfactory to resolve a matter.
- These issues usually turn out to be the ones the contractor cares about



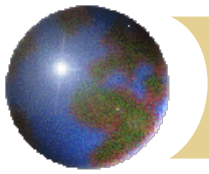
(“the Integrated Method”)

- In our view the contract should represent a clean break from the tender and negotiation history
- The general rule of evidence is that if a document is not in the contract it can't be used as evidence
- To have a clean break this means that all the “kitchen sink” documentation described a moment ago must be synthesised and relevant information integrated into the contract somehow
- This is obviously a lot of work for somebody. That somebody should be the engineer or employer.... BUT



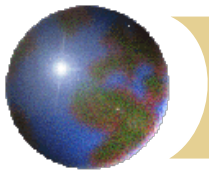
(“the Integrated Method”)

- Special Conditions versus issuing new updated tender documents for the contract
- Updating the tender documents means you lose a record of what was specifically and finally agreed to as a change
- This problem may not matter contractually or legally, but it can help ease administration later: “Look Mr. engineer we changed that – see right here.”
- Updating the tender documents is usually more work



(*“the Integrated Method”*)

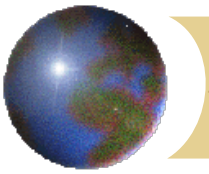
- Preparing the Special Conditions is a lot of work
- It involves sifting through all the documents that would go into the “Everything -In” method and pulling out the current and relevant information
- The Special Conditions should clearly state the following in terms compatible with the rest of the contract:
 - What precisely has been deleted from the documents and what has been added. i.e. what is the change
 - Where in the documents does this apply exactly
 - If it is a clarification a new specification sub-section may need to be “added” or a contract general condition sub-clause added
 - If an ambiguity is resolved the Special Condition should state where the ambiguity occurs in the documents and what was resolved. The non-applicable section should be deleted by reference
- This process will often bring pending items to the fore



(“*the Integrated Method*”)

- Does the pre-contract record become useless if an integrated approach is used?
- Not quite.
- The old documents should be kept carefully for practical reasons of contract administration
- Pre-contract information (even in an integrated contract) can be evidence of the parties state of mind
- Is completion September 17th or October 18th?
- If the contract does not already contain an “integrated” contract clause and Special Conditions are being drafted, it is suggested to add an integrated contract clause such as:

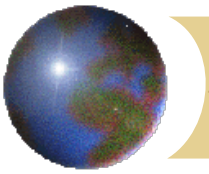
“The Contract contains the entire and only Contract between the parties respecting the subject matter hereof and supersedes and cancels all prior agreements, discussions and communications between or among the parties to this Contract, whether oral or written, including any discussions and communications which have been reproduced in any written form, tape recordings or any other manner and all documents and discussions issued or held during the call for tender and pre-contract signature and negotiation period.”



(“The order of precedence”)

Here are a few examples of the rules of interpretation:

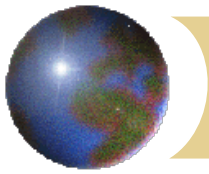
- Can the intention of the Parties be determined from the contract documents?
- A detailed or specific statement or document should prevail over a general document
- Ex: “All disputes will be decided by arbitration”; “aesthetic effects will be decided **only** by the architect”
- Likewise a document drafted by one of the parties should prevail over a standard document “borrowed” for the contract – where legal
- If a document is ambiguous it is construed against the drafter (Contra Proferentum Rule)
- Hand written documents prevail over typed
- Contract documents should be read as a whole and the interpretation which allows the most provisions to have a meaning should prevail



(The order of precedence)

What can happen when there is an order of precedence?

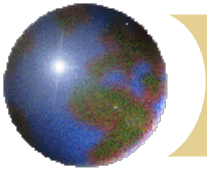
- The rules above are generally a logical way of guessing which document is more likely to represent the parties intent
- When an order of precedence is forced on a contract, the logic from the examples is sometimes broken and sometime followed
- Particular specifications over general specification – follows the logic
- Placing the scope of work over the rest of the technical conditions does not follow the logic
 - The scope of work is a general document which is often written hastily at the last minute and often prevails over all the rest of the detailed documents



(The order of precedence)

What can you do?

- Orders of precedence rules treat the symptom rather than the disease
- Obviously better risk reduction is achieved by raising and resolving ambiguities and conflicts during tender and seeking clarification where information is repeated
- Make changes in the order of precedence based on your knowledge of the documents and knowledge of the history of its existence if you think it makes sense
- Propose adding more detail to the order of precedence if you see that it misses out the annexes or other contract documents not mentioned
- When using the Integrated contract approach with Special Conditions be sure they are put at the top of the order of precedence



Dissecting the tender package (The order of precedence)

An example of order of precedence gone mad:

Conditions of Contract

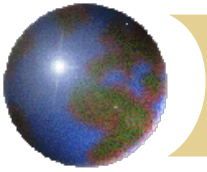
–The order of precedence for the Contract Documents shall be as follows:

- The Form of Agreement
- The Letter of Intent
- Contractor's letter of 22 March
- Conditions of Contract
- Contract Drawings
- Contract Specifications
- Contract Bills

Articles of Agreement

–The following documents are hereby incorporated by reference:

- Form of Tender
- Conditions of Contract
- Specifications
- Bills of Quantities
- Final Summary
- List of Contract Drawings Addendum
- Contract Drawings



Dissecting the tender package (The order of precedence)

An example of order of precedence gone mad (Con't):

Bills of Quantities

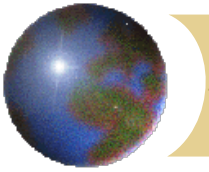
–The Contract Documents shall comprise:

- Letter of Invitation to Tender, Instructions to Tenderers and the Form of Tender
- The Articles of Agreement
- The Conditions of Contract
- The Specifications
- Bills of Quantities
- Contract Drawings
- All correspondence exchanged prior to the award of the Contract
- The Letter of Intent

Letter of Intent

–The following documents shall form the basis of and shall be incorporated into the formal Contract Document:

- The Tender Document and the Bill of Amendment
- The Tender
- Tender Queries 1 to 9
- Letter issuing the Bill of Amendment
- Contractor's letter of 22 March



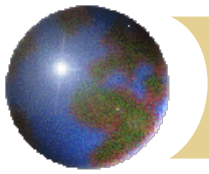
Dissecting the tender package (The order of precedence)

And the final madness:

Appendix F to the Contract

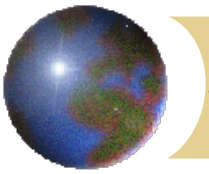
–Correspondence forming part of the Contract Documents

- Tender Queries 1 to 9
- Letter issuing the Bill of Amendment
- Letter issuing revised pages for the Bill of Quantities
- Contractor's Tender clarifications and qualifications
- Tender Summary
- Contractor's letter of 22 March
- The Letter of Intent



(The technical sections)

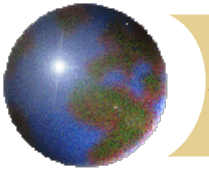
- Once the job's non-technical framework is understood the technical documents can be tackled with a better awareness for errors
- In a perfect world the technical documents should just be a set of plans and specifications, or employer's requirements on a turn key project, which have been prepared specifically for the project
- In reality technical documents (especially specifications) tend to be assembled from other projects in a "shreds and patches" fashion
- The problem is of course errors and redundancies



Dissecting the tender package (The technical sections)

Typical problems include:

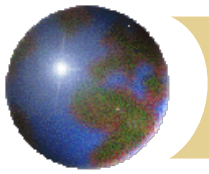
- Company “standard” design or practice guides
- Out of dates specifications
- Half baked scopes of work
- Employer’s requirements that mix “purchase description specifications” with performance specifications
- Employer’s requirements that include site rules, special conditions, programme constraints (kitchen sink)
- Impossible tolerance specifications
- Layering of standards (ex: Polish and/or French norms)



Methods and thoughts on dealing with employers during tender

Example

- Ex: Disney includes a Design Guide in their electrical tender documents. One item tucked away in there states that in all “ride” buildings the contractor shall include four electrical outlets along with each suspended mercury light fixture. You can't find this in the specifications and the circuits are not included in the schematics typically.
- Did Disney really want four outlets with each suspended mercury light fixture?
- If so this information needs to be in the Specification
- If not the Design Guide should be modified



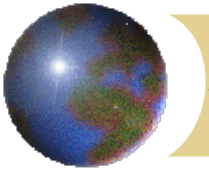
Discussion of design responsibility issues

“Design life” vs. warranty

Ex: A scope of works or a specification might call for an airport tarmac to have a 30-year design life and some much shorter warranty period. What is the contractor’s responsibility for problems occurring after the warranty period?

- There could be some room for design negligence if the applicable norms were not respected and the norm describes itself as being based on a certain design life
- Wherever possible, it is advisable to limit or eliminate this type of ambiguity
- Perhaps include a statement in the Specification e.g.;

“The Contractor shall comply with the Drawings and Specifications with respect to the construction of the tarmac Works. The design life of 30 years described in specification section 1255 page 5 Technical Conditions Volume 2/3 shall be deemed to be subrogated to the two year warranty for external Works described in General Condition Clause 27.4 and the Contractor shall have no further liability beyond the Warranty Period for the tarmac works described in Specification section 1255”

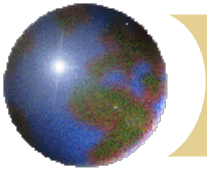


Discussion of design responsibility issues

Other catchy buzz words: like **“Western style shopping centre”** lurking in the technical documents

- Avoid generalities
- The above term was no more than a developer’s short hand to categorise the class of product without even the detail of say the term “three star hotel”
- Here again there is also the possibility of adding a clarification statement as in the design life example above as follows:

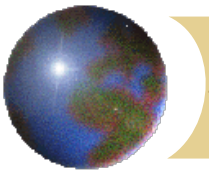
“Criteria for a Western style shopping centre are limited to, the description of the Works as contained in the Contract.”



Discussion of design responsibility issues

Ex: the technical documents call for a category III IT backbone installation and the scope states all Works shall be state of the art. Does the contractor owe a category V or maybe category VI installation?

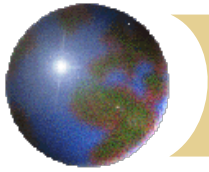
- These types of problems often happen when consultants cut and paste an old specification from their library



More on problems with the technical documents

Mixed performance and purchase or design specifications

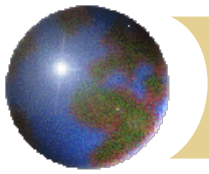
- Generally we classify specifications as being either:
- Performance specifications: these require a specific performance to be met and nothing more. (e.g. the air conditioning system must maintain a maximum of 23°C inside the building with an ambient outside temperature of up to 40°C)
- Purchase specifications: these are very detailed specifications which impose methods and specific makes and models of equipment and material
- Design specifications: these typically detail methods and list acceptable manufacturers. They may list model numbers within the manufacturers' range
- Frequently employers will take the belt and braces approach and cover a purchase/design specification with a performance specification



More on problems with the technical documents

Mixed performance and purchase or design specifications

- For contractors this is a double problem.
- The two sets of specifications can be latently incoherent. There is usually not enough the time or resources to do the calculations to confirm if the detailed design in fact would meet the performance requirements
- Secondly, if the detailed design turns out to be over-designed there is theoretically no means of picking up the design savings otherwise available if the sole criteria had been just a performance specification



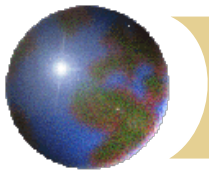
Discussion of design responsibility issues

Transfer of control and transfer of risk

Ex: A hydro power plant was under refurbishment. The design build contractor reacted to a new seismic code by adding a 30cm slab to the main power level for stability. Being a change in legislation, the contractor called for payment as a variation.

The engineer did not accept the need for the slab reinforcement and refused to approve the contractor's design. The contractor refused to build without the reinforced slab and the project came to a halt

- Which Party should prevail?
- Possible solution modify the design liability under the contract for the civil works portion of the design build contract only



More on problems with the technical documents

The problem with scopes of work

- How does the breakdown of the contract price or a bill of quantities interact with the plans, specifications and scope of works?
- Depending on the wording of the contract they can be considered a “scope” document or be included for information only. Lack of clarity here can create a nebulous situation
- Our view is that they should not be relied on or used as a scope document. An introduction to the price breakdown as follows can be useful:

" The Contractor acknowledges that notwithstanding the Breakdown of the Price contained herein, which is provided for information purposes, that the total price shown is all inclusive of all services and items of cost necessary to provide the Works described herein and in accordance with Master Milestone Schedule.

The Contractor shall refer to the SC and the TC for a complete description of the Works."

- **Conflicting rules about measurement**
 - **Example of saying the same thing twice**

Read the following extract from the Specification Part A (left window).

Now read the following extract from the General Condition Sub-Clause 12.3 [Evaluation] covering the same issue. (Right window) Is there a conflict or are they complementary?

If there is a conflict then the General Condition prevails.

1.4 Measurement and Payments

- 1.4.1 The methods of measurement and payment shall be as described under various items and in the bill of quantities. Where specific definitions are not given, the methods described in BIS Codes will be followed. Should there be any detail of construction or materials which have not been referred to in these specifications or in the bill of quantities and drawings but the necessity for which may be implied or inferred wherefrom, or which are usual or essential to the completion of the work in the trades, the same shall be executed and if such work becomes an extra item of work, in the opinion of the Engineer, then it shall be analysed by the Engineer and got approved by the Employer for payment to the contractor.

For each item of work, the appropriate rate or price for the item shall be the rate or price specified for such item in the Contract or, if there is no such item, specified for similar work.

Any item of work included in the Bill of Quantities for which no rate or price was specified shall be considered as included in other rates and prices in the Bill of Quantities and will not be paid for separately.



Thank You!

