

Fédération Internationale Des Ingénieurs Conseils (FIDIC) Variation Order Clause

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Abstract

To paraphrase the Greek philosopher Heraclitus, change is the only constant in construction projects. Changes in scope occur as projects progress from design through practical completion. FIDIC General Conditions Clause 13 [1] is one of the most important terms and implementing. It is also major factor for project success. Once all project parties understand and fairly use this clause, the impact will be minimising the expected disputes by 50% at least. Thus, this paper is considering illustrated variation order clause by flow chart technique to ensure that all the engineers are handling easily those subclasses.

Keywords

Variation Order, FIDIC, VO, Change Order, Clause 13

1. Research Objective

FIDIC Clause 13: Variations and Adjustments [1] is our target in this paper to identify their different processes with each different issue. Illustrated by flow chart technique, we believe that above 90% of the claim dispute started with variation order.

Once all the contract parties got the same perception for the variation order, the minimum dispute will occur. This is our aim from this paper.

2. Variation Order

There are only two facts in life: Death and Changes. Just like death, changes are going to occur by any means, so you have no choice other than accepting them and going along with the flow. In the construction industry, the owner protects himself by Variation Order condition, so he can allow his projects to be more mature with any design improvement or new technology with state of the art equipment's and introduce the value engineering concept. Without this condition, the main contractor will execute the contract drawings precisely without allowing any required modifications.

Changes could be in shape, level, quantity, material type and even the location if within the site borders.

Any changes to the provisions in the contract are not Variation Order. We can limit the variation order to the technical parts of the contract, but when we need to change any legal part, then we should have addendum to the agreement signed and agreed by both parties, not an order from the first party.

2.1. Benefits

The standard forms of contract provide the variation clauses are enable the employer's design team to vary the design and specification. This is to avoid any problems that a contract would and in principle, should be re-negotiated due to the changes of specification of works [2].

One of the benefits of variation is also allowing such changes to be made stated in the contract and permit to any consequential to be made in the contract sum.

Variation allows the constructive changes that allow changing on the mistake and error accidently occurred such as example in correcting a discrepancy in the contract drawing and specification.

Variation order also eliminates unnecessary cost from a project to optimize the client's benefit against the resource input by reducing the unnecessary costs [2].

Allowing changes by using variation order is required to solve Local Authority decisions. Example, any amendment to the works regarding to the regulation and by law and approved by local authority is allows variation during the construction works [3].

2.2. Disadvantages

The disadvantage of variation is that allows the Architect, or other designers to delay making decisions almost until the last possible moment. This can be having serious repercussions on the planning of the project and in executing the works efficiently [3].

Cost overrun is the major contribution for the variation orders, especially during the construction phase. The early changes could save a lot of rework and minimize the cost overrun.

Dispute usually arises due to variation order between the parties of the contract, particularly when the contractor refused to accept the judgement of the consultant in term of fair valuation of a variation order.

The disadvantages of variation work usually allow contractor claim higher profit than the actual cost. As he should get compensation only, means without contingency, overhead and profit. Thus, where a contractor has secured a project on prices and terms which are profitable, he will have strong interest to argue that the additional work should be constructed as a variation and valued according to the prices and rates stated in the contract [3].

3. FIDIC Variation Order Clause

Clause 13: Variations and adjustments:

3.1. Flow Chart of: Sub-Clause 13.3 "Variation Procedure" [1]

See Figure 1.

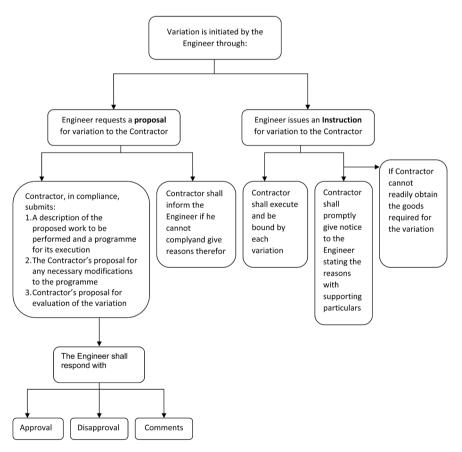
3.2. Flow Chart of: Sub-Clause 13.7 "Adjustments for Changes in Legislation" & Sub-Clause 13.8 "Adjustments for Changes in Cost" [1]

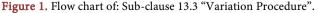
See Figure 2.

4. Conclusions

We hope that the flow charts of sub-clauses 13 will be used by the projects team and supporting them for implementing the contractual process clearly.

But initiating the dispute was and will still starting usually by variation





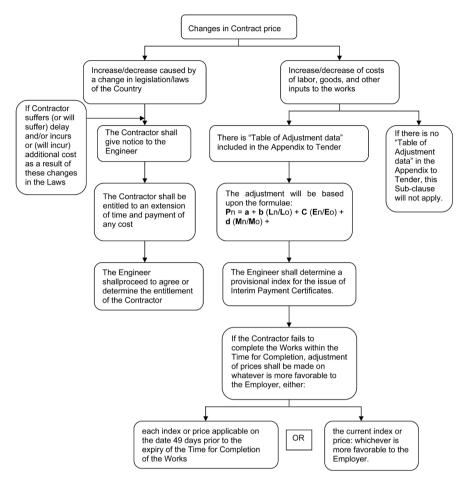


Figure 2. Flow chart of: Sub-clause 13.7 "Adjustments for changes in Legislation" & sub-clause 13.8 "Adjustments for changes in cost".

orders. The culture of the construction projects is accepting the changing in all project phases. The difficulties occurred from requesting those changing without time and money compensations.

Compensating the contractors needs to be common practices and follows the contractual process and each party gets his rights on time.

References

- (1999) FIDIC Conditions of Contract for Construction for Building and Engineering Works Designed by the Employer. International Federation of Consulting Engineers. <u>http://fidic.org/books/construction-contract-1st-ed-1999-red-book</u>
- [2] Bottari, T. (2014) Construction Change Order and Variation Management. <u>https://www.aconex.com/blogs/2014/03/construction-change-order-variation-management.html</u>
- [3] Law Teacher. (n.d.). Benefits and Disadvantages of Variation Orders. <u>http://www.lawteacher.net/free-law-essays/contract-law/benefits-and-disadvantages</u> <u>-of-variation-orders-contract-law-essay.php</u>