

**INTERNATIONAL JOURNAL OF ENGINEERING SCIENCES & RESEARCH  
TECHNOLOGY****DISPUTE RESOLUTION MECHANISM IN COMMERCIAL CONSTRUCTION  
PROJECTS: A REVIEW****Priyanka Sakate\*, Dr.Arun W. Dhawale**\*PG Scholar, Department of Civil Engineering, Imperial College of Engineering and Research,  
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**ABSTRACT**

The number and complexity of contract disputes have increased dramatically in recent years. At the same time, the delays and costs associated with litigation have become more significant. This section provides an overview of dispute resolution methods commonly used. The increasing trend to alternative methods of resolving disputes suggests a considerable dissatisfaction with the traditional litigation process, at least in certain types of construction cases. However, it must be emphasized that litigation is sometimes, although not always, still the best solution to the parties' problems. In present paper the different literatures are studied to compare the past studies in this area.

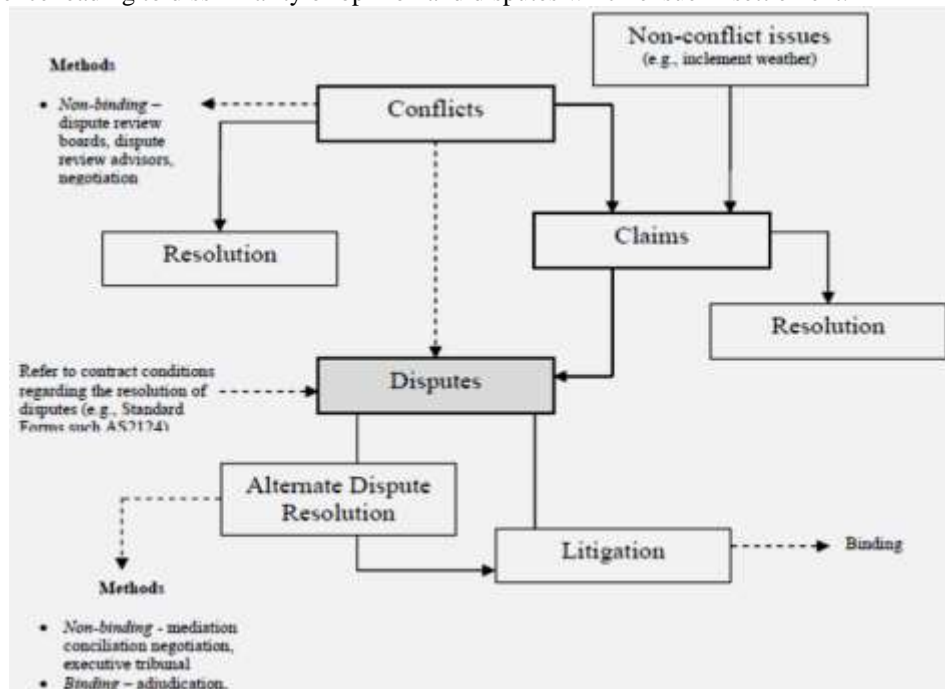
**KEYWORDS:** Dispute, Construction Management, Cost, ADR**INTRODUCTION**

Construction project are an important element of any country's infrastructure and industrial growth. As part of the process of standardization and improving efficiency in the construction industry, proper bidding conditions and regular bidding documents for domestic construction contracts have been developed and distributed to all Government agencies and public sector organizations as guidelines. There is necessity for proper dispute resolution mechanism in the construction division. A considerable amount of money is locked up due to disputes between contractors and clients, leading to cost and time overruns.

Construction contracts provide rise to disputes of unusual difficulty and complexity even by evaluation with other types of litigation. The performance of many construction contracts run over much longer periods than most other forms of commercial contract, with potential scope for disagreement and financial disagreement arising constantly during the construction period, and with large sums of money and cash flow pressures concerned on both sides. There is plenty chances of disputes or difference of opinion from the very inception of entering into the contract and commencing the work because consistently both the parties have to meet with reciprocal obligations on either side one after the other and a single case of default is satisfactory to upset the balancing pendulum and the whole development, programming enhance targeted schedule of completion of work. The employer wants to reduce the expenses in order to keep up the economic viability of the project within its restrictions, tries to bring down the expenses whereas the contractors universally called 'builders'. who invests large amounts by way of establishment cost in the form of machinery, materials, tools and plants as also onsite and offsite staff and at times own testing laboratories and research wings, planning and drawing wings, when confronted with unexpected situations where variations from the scope of the contract or undue delays by the owner which were not within the consideration of the parties at the tendering stage, unless remedied immediately, would upset the planning and programming and financial viability, enter into prolonged correspondence leading to dissimilarity of opinion and disputes which ensue in settlement.

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**Fig 1.1: ADR Method Of Dispute Resolution**

Alternative dispute resolution (ADR) encompasses a range of procedures other than litigation which are designed to resolve conflicts. In the past few decades the use of ADR has become more prevalent within both international and domestic contracts. Alternative dispute resolution mechanisms in the construction industry have wide application and disputing parties' reasons for adopting ADR are many and varied. However, the main reasons are that the costs of litigation are prohibitive and that it takes a long time to settle disputes or come to a ruling hence the parties in dispute and their advisers are now considering alternative methods to resolve disputes. The alternative methods are a realistic alternative to litigation and are cheaper and quicker methods of dispute resolution which do not so easily lead to a breakdown in the working relationships between the parties. Alternative dispute resolution techniques fall into two discrete types, i.e. those which seek to persuade the parties to settle and those that provide a decision. Where a decision is given then such a decision may have binding effect or may simply be a recommendation that the parties can accept or ignore.

The essence of ADR is to resolve conflict differences or disputes that exist between parties. The ADR process seeks to resolve these differences in two ways, namely:

- Where the ADR process provides the parties with a decision, the process is about establishing rights and obligations.
- Where the process is facilitative, then its purpose is about the acknowledgement and appreciation of differences.

The aim for the parties must be to establish the correct process in order to resolve the dispute. Construction disputes are fairly common, although they vary in their nature, size, and complexity

**RELATED WORK**

**C. Bvumbwe and D.W. Thwala (2011)**, This study assessed the dispute resolution methods used in the South African construction industry. Arbitration, adjudication and mediation are the most frequently used dispute resolution methods in the construction industry. A literature review focused on arbitration, adjudication and mediation in the construction industry. Closed-ended and open-ended questionnaires as well as interviews were conducted among the senior construction participants who included architects, quantity surveyors, construction managers, project managers and attorneys. The questionnaires were completed by 70 construction participants. The research concluded that for alternative dispute resolution (ADR) to be effective in solving disputes in the local construction industry, mediators, arbitrators and adjudicators with knowledge of the construction industry should be appointed. In terms of its characteristics, ADR should be the best option to resolve construction disputes. However, it is not being fully utilised due to the characteristics of dispute resolution itself and the absence of an appropriate framework to guide the disputing parties on the overall process. The literature review on the ADR developments and their effectiveness focused only on South Africa. This study provides a basis for using ADR effectively in the construction industry. The findings are of value for clients, contractors and consultants.

**Omkar Ashok Pawar, Rahul S.Patil (2014)** Are some construction projects more prone to contract disputes than others? If so, can these projects be identified before construction begins? This paper describes research conducted with the CII Dispute Prevention and Resolution Task Force to answer these questions. This research analyzed the effect of different project characteristics on the occurrence of contract disputes. This paper explains the project characteristics that were evaluated, and the conclusions that we made from this analysis. Conflicts may be considered in three levels; level one may be viewed as intrapersonal conflict that is the conflict that takes place inside the individual. Level two is interpersonal conflict the conflict experienced between individuals in the same group or unit for example co-workers, roommates, unit members and etc. Such clashes exist whenever individuals interact or come composed to finish a common goal or detached. Level three is the intra-group conflict, However, the fundamental conclusion from this research is that "people" hold the key to avoiding contract disputes.

**Manvendra Sinha, Dr. A. S. Wayal(2014)** Disputes have become an endemic feature of the Indian construction industry. If they are not resolved promptly they can escalate causing schedule delays, lead to claims that require litigation proceedings for resolution and destroy business relationships. The competitive nature and contractual complexity inherent within construction can aggravate the incidence of disputes. Research over the last two decades has revealed that factors such as scope changes, poor contract documentation, restricted access, unforeseen ground conditions, and contractual ambiguities are contributors of disputes. While this is widely known, disputes still prevail over such issues. Before disputes can be avoided an understanding of what the underlying conditions that contributes to their occurrence needs to be determined so that mechanisms can be put in place to prevent them from arising. In this paper the literature is examined and a series of models are developed to demonstrate the interdependency between key variables that contribute to disputes. The developed models are used to identify a number of strategies that can be adopted to reduce the immediate incidence of disputes in construction.

**Mohd Suhaimi Mohd Danuri, Zahira Mohd Ishan, Nur Emma Mustaffa and Mohd Salleh Jaafar (2012)**, The current dispute resolution procedures available in the Malaysian construction industry are mainly litigation and arbitration. In addition, the alternative dispute resolutions (ADR), namely mediation and adjudication, have also been introduced as the other methods for resolving disputes. The objective of this study is to examine the current practice of dispute resolution and ADR available in the Malaysian construction industry. The aim of this paper is two-fold: to report the current practice of dispute resolution and ADR, and identify the attributes of successful implementation of both mechanisms based on the perceptions of the Malaysian construction industry players. From the jurisprudence point of view, this study looks into the law as it is, in relation to the current practice of dispute resolution and ADR, by showing how those findings can be used to explain why improvement is needed to promote a successful and well received dispute resolution and ADR, and what lessons can be learnt, towards the formulation of a more viable methods for the Malaysian construction industry. NVivo software has been used to manage and organise the complete interview transcripts and facilitate the data analysis process for this study. Literature review reveals a continuous development of dispute resolution and ADR in the Malaysian construction industry, while, globally the industry has not only embraced ADR but also spearheaded the development of innovative forms of dispute avoidance mechanism. The findings of interviews show that locally, apart from litigation, the common types of ADR are arbitration, mediation and ad hoc mechanism. The findings also lead to the discovery of the following attributes: faster, less procedural, cost effective and

enforceable; regulation and government's support; professionalism and ethic; training; and facility, that may promote a successful implementation of dispute resolution and ADR in Malaysia.

**Nicholas Gould (1988)**, Alternative Dispute Resolution (ADR) has attracted a great deal of attention amongst the legal and construction professions of the UK construction industry since the mid- 1980s. Not only does ADR provide an opportunity to resolve disputes more efficiently than the traditional methods of arbitration and litigation, but it also provides increased scope for the involvement of non-lawyers. Construction professionals can and are becoming increasingly involved in mediation, conciliation, expert determination and adjudication. Essentially, this research focuses on the perceptions of the key individuals in the field of construction disputes. The results of the largest postal survey of its kind compare the range of dispute resolution techniques. The dispute resolution pathway is most frequently dictated by the construction contract - a factor which has been further complicated by the unilateral right to adjudication under the Housing Grants, Construction and Regeneration Act 1996. In parallel, the "softer approaches" of mediation and conciliation are developing and playing an increasing role in the resolution of construction disputes. Finally, the above factors coupled with the developments in dispute resolution clauses and the vying for dispute resolution services produces a dispute resolution landscape which is dynamic and developing. In conclusion, the research demonstrates that few in the industry have enough experience of the range of dispute resolution techniques required to make an adequate assessment of which technique is best for a particular dispute.

**David W. Halligan, James G. Zack, Adam K. Bult and Jonathan Pray (2006)**, Construction industry disputes are common and the amounts in dispute are frequently quite high. Additionally, disputes in the construction industry are often quite complex, thus making it difficult to present issues clearly to non- technical triers of fact. Until the late 1980s, the traditional dispute resolution process involved negotiation and some form of administrative appeal, possibly mediation, followed by either arbitration or litigation. As a result, the construction industry has developed a number alternative means of resolving disputes. Alternative dispute resolution ("ADR") has become common in construction. 6 With parallel pioneering efforts of various public agencies and construction trade associations, numerous ADR techniques have been developed and implemented, all with the end goal of resolving disputes without resorting to the traditional, time-consuming and expensive litigation. This chapter identifies and discusses, in a summary manner, nearly thirty forms of ADR that are being used in the construction industry. Some are merely variations of a theme, but all are different, and all have advantages and disadvantages that should be considered prior to selection. The various forms of ADR are presented in what the authors believe is a logical order following a dispute from the project site to the adjudicative forum.

**Zuhairah, Azlinor, S. And Rozina (2005)**, In Malaysia, ADR is seen as an alternative to litigation in resolving contractual disputes as it is perceived to be cost saving, more private and able to avoid ill-will or animosity as it sometimes does, in litigation. In the Malaysian construction industry, the present practice of ADR is focused mainly on arbitration. However, with the revised standard forms for construction contract, proposals for the Mediation Act and the Adjudication and Payment Act, there is a strong indication that ADR will be a common feature in resolving construction disputes in Malaysia. This paper intends to highlight the application of ADR in construction contracts with reference to three main standard forms contract, which are referred to in Malaysia; the PWD 203A (2007 edition), the PAM 2006 and the CIDB Standard Form of Contract for Building Works 2000. The main objective of this paper is to analyze existing provisions in the three standard form contracts and to evaluate their significance in resolving disputes between parties of construction contracts.

**Edwin H.W. Chan and Henry C.H. Suen (2004)**, Purpose – Unfamiliar with the Chinese culture and ways of doing business, foreign architects/engineers/contractors (AEC) firms will encounter differences with the local parties. With reference to the characteristics of Chinese culture on disputes, this paper studies the problem areas of dispute and of resolving disputes in international construction projects in China. The objectives are to: examine the fundamentals of Chinese culture and ways of doing business; examine the characteristics of international projects and investigate any differences in the dispute problems arising from China International Projects; identify the most popular dispute resolution mechanism(s) for international projects in China; and recommend possible ways to reduce and resolve disputes of these projects. Design/methodology/approach – After literature review, a questionnaire was designed for face-to-face interviews with 40 practitioners to collect their opinions. Findings – The results show that the problem areas giving rise to disputes are mainly related to contractual matters. To reflect the characteristics of international projects in China, cultural and legal matters are also found to be the sources of problem. Arbitration is the most popular method, after negotiation, for resolving disputes in international construction projects in China. Research limitations/implications – The number of interviewees in this study could be improved and further study could include experts in Mainland China. Originality/value – There is not much literature on dispute resolution management for international construction



projects in China, with particular reference to cultural differences. This paper offers an invaluable reference for those foreign AEC firms interested in joining international projects in China.

**Rasheed Isa and Fidelis Emuze (2001)**, The nature of construction projects requires the participation of parties with different skills. Clients, designers, contractors, subcontractors, suppliers and manufacturer are always party to a project. Diversity in interest and goals means dispute can occur where multiple parties are involved. For instance, construction projects in Nigeria experience breakdown due to disputes. This shows justification for this research, which addresses perceptions of construction stakeholders relative to dispute resolution in Nigeria. The descriptive survey research design was employed, and a questionnaire was used as the tool for data collection where eight dispute resolution mechanisms were identified and classified. The results ranked negotiation and mediation top among the mechanisms. However, negotiation was ranked high because it is perceived to be time and cost saving, while improving working relations. The study concluded that negotiation and mediation were effective alternative dispute resolution mechanism based on the dynamics of project relationships in Nigeria.

**Judith Stilz Ogden and Nikki McIntyre Finlay (2008)**, the goods and services they buy; businesses want the highest prices they can get for the goods and services they sell. Workers want the highest compensation package possible; employers want to minimize costs. Under the assumptions of competition, the forces of supply and demand ensure that a price that maximizes total welfare (consumer surplus plus producer surplus) is set. The assumptions of competition are heroic. There must be a lot of buyers and a lot of sellers. All firms will charge the same (market) price, because products are homogeneous (indistinguishable from each other). There must be easy entry and exit into the industry. Both sides of a transaction must have all the relevant information. If any of these assumptions is violated, the industry is not competitive. Under non-competitive conditions, total welfare may or may not be maximized. Most industries in the US are fairly competitive. In many cases, regulation arises to protect the various agents under non-competitive situations. However, disputes arise, particularly when one agent in a transaction has information that the other party does not. Negotiation of contracts, disagreements about the terms of a contract, and improper behavior can also lead to disputes. Over the past twenty years there has been an explosion in the use of different dispute resolution methods.

## CONCLUSION

The study until now was performed on predicting the system Problems which leads to dispute and parties involved in the dispute used to manage the construction work on site. Many researchers derived different methods to resolve the dispute and increase the effectiveness of work on site and ultimately deal with the cost effective project. The conclusion of dispute is delaying in work which influences the cost of project this leads to inflation in estimates cost of project. Many methods are mentioned to solve the dispute but in India rules and laws are prepared for the same purpose. This leads to find the appropriate method to be followed by the parties to solve dispute.

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