

Analysis of the Impacts on the Jefferson County Courthouse Complex through Project Labor Considerations

Prepared for the:

**Jefferson County Board of Legislators
and
Bernier-Carr and Associates, P.C.
Engineers, Architects, Surveyors and Construction Managers**

September 20, 2000

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September 14, 2000

Jefferson County Board of Legislators
County Building
Arsenal Street
Watertown, New York 13601

RE: Jefferson County Courthouse Complex


Dear Ladies and Gentlemen:

Presented in the following report are various issues to be considered in evaluating the applicability of a Project Labor Agreement (PLA) on the Jefferson County Courthouse Complex Project. As necessary, the assessment focuses on a number of considerations, and evaluates the economic cost/benefit impact of adopting, or declining to consider further the PLA on the project.

It must be recognized that there are a number of broad assumptions that are possible in the performance of an economic analysis of the project impacts through the adoption of a PLA. Assumptions utilized on other projects, at other locations, are not universally applicable to all projects, particularly the courthouse building project under consideration in Jefferson County. The Jefferson County project is a unique undertaking, in a specific market, with its own particular set of characteristics that have been assessed.

The evaluation that follows will provide the County with the necessary data to make an informed decision on the proper action relative to the Project Labor Agreement.

Very truly yours,

A handwritten signature in black ink, appearing to read "Paul G. Carr". The signature is fluid and cursive, with the first name "Paul" and last name "Carr" clearly distinguishable.

Paul G. Carr, P.E.

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Analysis of the Impacts on the Jefferson County Courthouse Complex through Project Labor Considerations

1. Background:

A Project Labor Agreement is a form of collective bargaining agreement used in the construction industry to stabilize the core element of the labor/management relationship: the Work Rules. These agreements have been commonly utilized over the years on a project by project basis. They have at times been referred to as Project Labor Agreements (PLA), Government Mandated Labor Agreements (GMLA), and Project Stabilization Agreements (PSA), among other descriptors for this form of *pre-hire* labor agreement.

The core of these agreements are the establishment of unified work rules for the project, known to all before the project is begun. On construction projects that are manned predominantly with union labor, the uniformity of coordinated work rules, common to all of the trades on the project can offer benefits to all participants. With the potential of fifteen or more separate collective bargaining agreements in force on a project, certain advantages can be effectively secured through a uniformity of work rules agreed to by all. Without these uniform work rules the potential for dispute exists.

One point of potential conflict is found in jurisdictional disputes among different crafts "claiming" certain work duties for members of their own union. A second conflict area is with the expiration of existing collective bargaining agreements during the course of the project. This need to negotiate a new agreement during the course of construction could expose the project to a work stoppage or strike. It is not unusual, and even commonplace that the negotiated Project Labor Agreement's duration spans beyond the term of the collective bargaining agreements for each trade. The PLA offers a greater assurance of achieving the "no-strike" provision's protection where needed, thus ensuring a continuity of the work.

For the unions, the attraction of the PLA is that it typically ensures that all "new-hires" on the project's workforce come from the union hiring hall. In addition to the union dues

collected from these employees, it is typical that full union wages and benefits are paid by the employers.

For the facility's owner, when confronted with a large and complex project, under stringent time schedules, sometimes with penalties for late completion, the elimination of potential delays resulting from labor strife may provide adequate incentive to enter into a pre-hire agreement. In areas where the labor supply is short, the additional incentive of an adequate supply of men and women representing workers from the required construction trades provides assurance for predictable project outcomes.

In the private sector the use of PLAs are common, particularly in the cases where national contractors are entering markets far from their "home turf". In these situations it is important for a contractor to have a clear understanding of the "work rules" in order to determine his labor costs before completing his estimate upon which his bid is offered. The clear understanding of the availability of craftsmen is also a reason for the project specific labor negotiations prior to a project's bid. Labor is a critical resource that must be considered and evaluated when a contractor is preparing to submit a bid for a project. The known, or negotiated work rules, will serve to remove certain contingencies during bid preparation and subsequent construction activities. Under the right conditions this may serve to stabilize a project.

2. The Jefferson County Courthouse Complex:

a. Scope: The Jefferson County Courthouse Complex is a facility to be constructed in the city center of Watertown, New York. The work will consist of the construction of a court facility. This work includes new construction along with the adaptive reuse and reconstruction of an existing building. These two sections of the facility will be joined to form a single court complex structure.

b. Cost: The project carries a budget of approximately \$14 million. The total area of the complex is in excess of 80,000 square feet.

c. Schedule: The project schedule contemplates construction commencement in the spring of 2001. The duration of the project is expected to run for approximately 16 months from project initiation through substantial completion and beneficial occupancy.

3. Labor Needs:

For practical purposes, essentially all of the major trade classifications covered by the Section 220 of the Labor Law's Wage Rate Determinations, and represented by the AFL-CIO Building and Construction Trades Council, will find work within their respective jurisdictions on the Jefferson County Courthouse Complex project. Certain trades will be represented on a more significant (time) basis than others. It is presently estimated that the total craft time required for the completion of this project will approximate 140,000 hours.

Of the labor classifications defined by the New York State Department of Labor, the major craft trades to be found on this project will be carpenters, masons and laborers, each with over 20,000 man-hours expected. It is expected that the boilermaker and sheet-metal trade, along with the electrical trade, will each provide in excess of 10,000 man-hours. The craftsmen providing iron-working, roofing, painting, glass and glazing, plumbing, and heavy equipment operation will each provide less than 7,500 man-hours per trade.

The breakdown of the labor loading needs for the project is a function, not of the total project duration, but rather the time that each trade is actively involved on the site. For example: if the roofing work were to require a total of 2,500 man-hours, this would not result in a crew of 1 man ($2,500 \text{ m-h} / 16 \text{ months} / 173 \text{ m-h per month} = 0.903 \text{ men}$). Rather the roofing crew would arrive at the job-site, and likely complete the work within a three week period, for an average crew size of 21 men ($2,500 \text{ m-h} / 3 \text{ weeks} / 40 \text{ hours per week} = 20.83 \text{ men}$).

In order for this study to make a proper assessment of the local labor market's ability to provide the needed number of skilled craftsmen, whether union affiliated or not, it is essential to make an accurate appraisal of the project's manpower loading. The evaluation of the court complex indicates that the maximum workforce anticipated on-site at the peak of construction will be upwards of 140 men and women. The represented trades will include for the most part carpenters, masons, laborers, equipment operators, ironworkers, electricians, plumbers, and sheet-metal workers.

The contractors that will be active on the project during this peak period will be each of the four primes, along with a number of sub-contractors. The estimated peak workforce anticipated for each of the prime contractors are, General Construction, 41; Electrical Construction, 7; Heating and Ventilating, 5; and Plumbing, 6. These estimates are exclusive of

sub-contractors that will supplement the core workforce of each prime. This peak also reflects an orderly and logically scheduled progression of the work.

4. Existing Available Project Labor Force:

A significant portion of the project related discussions that have taken place in private interviews, as well as in various public presentations, have centered upon the availability of an adequate number of trained workers to meet the needs of this project. These discussions invariably move to the arena of whether or not the workforce being evaluated is made up of "local" workers. Furthermore, these issues move to varying claims of "guarantees" of local, or hometown labor's participation in the work. This investigation has found the tenor of these statements to be one sided and generally with little merit or supporting logic; regardless of which side is offering the data.

Based upon the assessment of the needed workforce for this project, the question becomes simplified. Are there, in the local construction market, an adequate number of skilled workers to meet the needs of the Jefferson County Courthouse Complex? Are they available from the local union hiring halls, in the event a union affiliated contractor is the successful bidder? Likewise, in the event that a merit shop contractor is a successful bidder, unable to draw from the local union halls, are there a sufficient number of locally available skilled workers to meet the needs of the project?

According to various firms interviewed, and from construction experience in the Jefferson County area, there are an adequate number of skilled workers, both from the union halls and from the core workforce of the local merit shop companies to meet, and exceed the needs of the courthouse project.

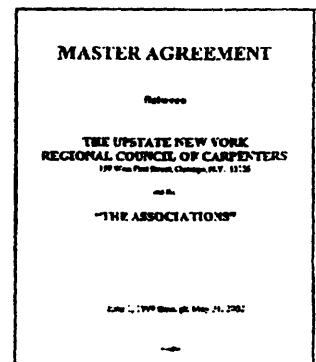
The question then moves to, what then constitutes local? Various organizational claims range from 2,500 construction workers available from the union halls, to 3,500 construction workers employed "locally" by merit shop companies. Each of these claims involving the number of "local" workers is at best misleading, and at worst simply wrong. The matter for consideration of the Board is whether there is a reasonable business purpose for a PLA. The matter is the simple question of whether the local labor organizations, union affiliated or merit shop, can provide a reliable source of skilled building trades workers in all crafts, for the

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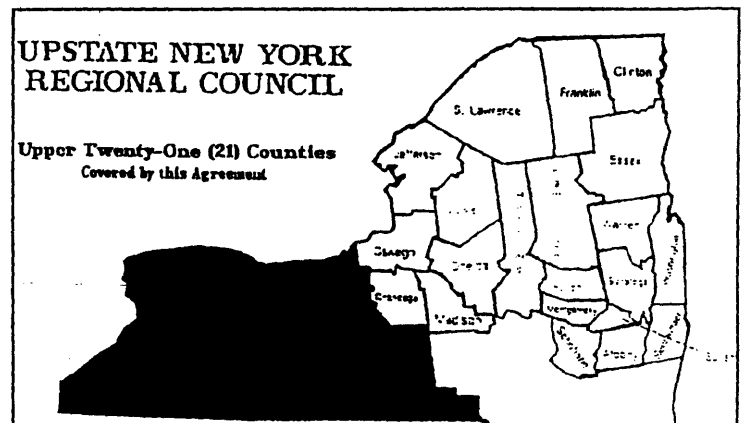
duration of the project. It should be kept in mind that this is not a matter of the total available workforce for this project. This threshold question is a matter of whether there are 140 skilled men and women available, as a resource to the contractors choosing to provide a bid for the work on this project. The answer to that question is yes, there are available workers from either industry sector, union or merit shop.

The Building Trades Council offers that the only way the County will be assured (guaranteed) of using "local" craftsmen will be through a PLA. While the suggestion is certainly well intended, and accurate from one perspective, it requires further investigation to establish one's definition of local.

Most PLAs require the unions to fill an assignment within 48 hours. If the union hiring halls are responsible for finding labor for the project, the measure of defining the location of origin of the workforce will be by the terms of the Agreement. The agreement covers the area from where the workers may be called in from, thus offering insight into whether one entity's definition of "local" agrees with the other's.



While the Trades Council offers assurances that the primary source of workers would come from the targeted "local" area of a four-county region; Jefferson County and its contiguous county neighbors, there is no guarantee of this through a PLA. For example, the area covered by the Carpenters' Agreement is a 21 county region, reaching as far south and east as Albany. This is shown in the adjacent figure. Other collective bargaining agreements that would comprise the basis of a PLA have similar range to their area of governance.



This is not to suggest that if the project were to be successfully bid by a contractor, who was not affiliated with the local unions, there would be any assurance or guarantee of "local" labor usage. It is conceivable that an "out of town" contractor may very well successfully bid on

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the project. It is certainly possible that such a contractor could “import” his workforce. It should however be kept in mind that there would be at least four prime contracts on the project. This diversity of contracts, along with local bidding and sub-contracting history suggests that the gain of a higher assurance of local labor participation through a single mandated hiring source lacks merit.

Conversely, there is no limitation that would prohibit a union contractor, either from the four county region or beyond, from successfully bidding the project. Thus, that contractor would draw from the hiring halls represented by the collective bargaining agreements, with workers available from the entire geographical region of the union locals, well beyond that area a number of people consider “local”. As a practical matter “out of town” labor costs more. In an openly competitive market environment, the least costly labor, considering source and ability will be reflected in the project’s bid offers and thus secure employment on the project. This in itself provides a reasonable expectation for the maximum participation from local persons.

Simply stated, it is neither practical nor possible to predict that the county will achieve any meaningful guarantee of hometown labor through the employment of a PLA. The greater force at play is that of the market, dictating from how far craftsmen will travel for employment opportunities, whether members of a building trades union, or not.

5. Adequacy of the Local Labor Market:

The Jefferson County Courthouse Complex will require a peak workforce of some 140 workers, with an average workforce of approximately one-third that number.

It is claimed by both the merit shop employers and the Building Trades Council, that the available men and women who live in the four-county area, are sufficient to complete the work on this project. Experience suggests these statements to be true and accurate. The counties of Jefferson, St. Lawrence, Oswego and Lewis are classified as “local” for the purpose of this report.

There is no evidence or compelling reason to suggest that either the union hiring halls or the traditional merit shop contractors serving the Jefferson County market will be unable to provide a fully staffed, skilled workforce.

The probability of utilization of “local” labor for the courthouse project is high, regardless of the existence of a Project Labor Agreement or not. This position is based upon a review of a number of past and present construction projects within the immediate vicinity.

6. Labor Agreements Covering the Project Site

It is a legitimate concern on certain projects that the expiration of existing collective bargaining agreements, during the construction period of a project, could impose a contingency variable on those contractors working within the union environment. From a wage standpoint, on a project subject to Prevailing Wage Rate Determinations, the re-negotiation of collective bargaining agreements is also a contingency risk to merit shop contractors. The wage rate negotiated through the collective bargaining process generally becomes the Prevailing Wage, thus merit shop contractors would also be subject to wage increases mid project.

The expiration of those agreements, for the union contractor, may interfere with the continuous and logical sequencing of a project, a result of labor strikes. This potential interference could continue while all terms of the “work rules” addressed in the agreement are resolved, not only wages. Such a slowdown of the work, on a project with union contractors, could conclude with negative consequences for a project owner through late completion. The PLA intends to place union and merit shop contractors on an equal footing with the “no-strike” clause.

Projects with strict mandated completion dates might be sensitive to such considerations, particularly in a market heavily dominated by union contractors. In such an instance it could be in the owners best interest to seek protections through a “no-strike” clause, traditionally a component of a PLA. Unfortunately, even with the best intentions of representatives of both labor and management, wildcat strikes can and do occur. Case in point, the San Francisco Airport project, with a PLA, found a significant number of the union carpenters unhappy with the concept of the PLA, claiming that the contractors had received too many concessions, thus they conducted a strike on a “no-strike” project, shutting the work down. Even with the best of intentions, there are no guarantees.

Relative to “normal” conditions; the question is raised as to what is the likely exposure to a project disruption from collective bargaining agreement expirations. Under a project being

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performed by non-union contractors, there are no agreements to expire; therefore a strike is not an issue. In a situation where either one or all of the successful contractors were union affiliated, there would exist a potential for disruption.

However, when one evaluates the expiration dates of the existing collective bargaining agreements with jurisdiction in Jefferson County, it is seen that many agreements already cover the entire duration of the project (April 2001 – May 2002). Those that do not, generally expire on May 31, 2001 (i.e.: masons). Those agreements could present some exposure to interference, however it is not anticipated that at this time (May 2001) there would be any masons on the project. The probability is low that the masons would not settle a new contract, hence cause a project-wide shutdown of the work. On a project of short duration, the exposure to work interference due to labor agreement expiration is low. This is a project of short duration.

A second criterion for the consideration of adopting a PLA is “whether delays in performance of the construction contract would have a significant adverse impact on the mission of the agency or operation”. There is no evidence of criticality of the completion date for the project. Furthermore given the scope and nature of this work there is no evidence to suggest that the adoption of a PLA for this project would offer greater assurance of an on-time delivery, even if this were a driving criteria.

7. Wages for Project Workers

The New York State Department of Labor establishes the “prevailing wage rate” for each particular region. These rates are based upon the negotiated collective bargaining agreements covering that area. The wages and benefits are then reflected in the “wage rate determination” for the public works being performed within a particular jurisdiction. Jefferson County, and the project being undertaken for the courthouse, is subjected to the prevailing wage laws of New York, specifically Section 220 of the labor law. Since the prevailing wage law is the source and standard of applicable wages for the project workers, and this wage is in concert with union wages, neither union nor merit shop contractors hold an advantage or disadvantage relative to workers pay. From a societal standpoint, all workers on this project, whether represented by the union or working directly for an open-shop contractor, are paid the rate that is determined by law to be a fair wage for the work performed.

There is no suggestion that the wage requirements found in union agreements would, in and of themselves, inflate or reduce the cost of the project. The contractors are required to pay prevailing wage with or without a labor agreement, so the cost to the county should not vary as a result of the worker's pay. The difference in cost of labor between union v. merit shop might be expected to flow from the enforcement of other "work rules" found in collective bargaining agreements. It is the concessions from these work rules that form many of the computations for "cost savings" which are attributable to Project Labor Agreements.

8. Legitimate Business Purpose

The primary task of this study now enters the evaluation of whether or not a Project Labor Agreement would hold a *legitimate business purpose*. To conduct this appraisal as to whether or not a legitimate business purpose exists, the baseline for cost comparisons must be established. For the Jefferson County Courthouse Complex the baseline logically must be those standards established within the Prevailing Wage Rate Determination, not the entire set of work rules for the existing collective bargaining agreements. Most of the work rules contained in the existing collective bargaining agreements form the basis of the requirements of the wage rate determinations, including holidays and overtime, although not all.

Cost savings in studies for other projects have been presented through an evaluation of the estimated value of the concessions to "standard union work rules". This is then a one-way comparison. These rules, hence the value of the concessions as a "saving" would only apply in the instance that it was to be a foregone conclusion that a union contractor, using union labor was going to be the successful bidder. The fact exists that any "concessions" made by the unions, to the union contractors, which enhances the latter's competitive position, can be negotiated with or without a Project Labor Agreement.

Without a PLA, each contractor, union and non-union would be allowed to compete in an atmosphere of "unfettered competition". Work rule interpretations and concessions made between the union representatives and the union contractors competing for the project, simply bring all to the baseline of the market in Jefferson County.

9. Summary of Interviews with Key Participants in the Construction Industry:

As a part of this investigation there have been a number of interviews conducted. The data contributing to much of this study comes from the input of the various interviewees. The interviews necessarily included the representative of the Building Trades Council, Mr. George Intschert. The interviews also included representatives of both union and non-union contractors in each of the Wicks Law subdivisions of contract separation. Each of those interviewed offered valuable insight into this matter, and universally the response to my inquiries was positive, open, forthright and professional.

The key element that came from the interviews, regardless of the source was that this matter is not, and should not be a matter of union v. non-union. This direct issue carries significant and potentially harmful political overtones for all concerned. It was recognized by all of those interviewed, that a large percentage of the merit shop employees in the Jefferson County "local region" were at one time or another members of the various trade unions. It was further recognized by all that the union members and the merit shop construction workers are a group of hard-working, skilled individuals providing valuable services to the public in a very challenging industry.

It was the general agreement from those interviewed that this matter should not pit men and women against one another based on union affiliation. This decision, for or against the utilization of a PLA must be based upon the benefits or costs that this project delivery approach will bring to the work.

10. Benefit/Cost or Economic Considerations:

The requirement for an owner to utilize a Project Labor Agreement is that there must be present a *legitimate business purpose* for entering into a PLA. Additionally, it must be considered whether or not a Project Labor Agreement will offer a reasonable expectation for the advancement of the objectives and goals of competitively bidding the Jefferson County Courthouse Complex public works project.

Those objectives and goals of competitive bidding have been enumerated in numerous summaries. Excerpts of some are to: 'guard against favoritism, extravagance, fraud and

corruption, to prevent the waste of public funds, and to obtain the best economic result for the public'; 'inviting competition'." The purpose of the competitive bidding procedure is to 'secure the best work... for the lowest price practicable... and not for the enrichment of bidders.' The goals are also to 'stimulate advantageous marketplace competition' finding the 'lowest responsible bidder whose offer best responds in quality, fitness, and capacity to the particular requirements of the required work.'

It is well established that the County has the legal authority to enter into a Project Labor Agreement, if certain conditions are met. It is the purpose of this study to investigate those conditions and advise if there is a compelling business purpose for adopting a Jefferson County Courthouse Complex Project Labor Agreement.

The criteria for consideration, form the basis of the following evaluation of specific issues. The criteria include:

1. Whether past experience with the construction projects in the location where the project will be performed indicates that a PLA will be effective;
2. Whether delays in performance of the construction contract would have a significant adverse impact on the mission of the agency or operation;
3. Whether there are applicable laws, which impede the use of a PLA;
4. Whether the labor organizations in the area can provide a reliable source of skilled building trades workers in all crafts, for the duration of the project;
5. Whether the government can benefit from uniform work rules and working conditions and established procedures for resolving labor disputes, no strike/no lockout protections;
6. Whether the government can benefit from increased stability and labor peace that derives from greater labor-management cooperation;
7. Whether the requirements of a PLA will unreasonably restrict competition;
8. Other relevant information;

The consideration of the issues listed above are included throughout the following analyses of the economic impacts of the Project Labor Agreement.

a. No-Strike Protection – In an open-shop environment there is no opportunity for strikes by workers, therefore unless there was a high expectation that the project would be a union only job, there are no legitimate savings that can be attached to obtaining a "concession" that does not exist. Furthermore, the history of organized labor strife in the Northern New York construction market over the last twenty years is virtually non-existent. In addition, the existing collective bargaining agreements either presently span the planned period of construction or expire at a time in the project when the workforce will be at a minimum. *There is no projected saving to the project for the concession of a no-strike clause.*

b. Regular Work Hours/Work Days – Due to the complex and closely coupled nature of a building project of the character of the Jefferson County Courthouse, it is not a reasonable expectation that flexibility in work hours could be logically utilized. In fact, it would be the opinion of this study, for this project, that the active encouragement of ‘flexible’ work hours would invite disruption and chaos. The existing work rules of the Department of Labor (the baseline for savings) currently afford sufficient opportunity to meet the needs of the project, its contractors and sub-contractors. The evidence suggests that there could be savings associated with the project-wide use of 4 – 10’s v. 5 – 8’s. The non-productive pick-up time would be reduced during one day per week. If there was an average of 50 men on the project, for the duration of 70 weeks, it could be projected that the savings would be approximately \$50,085 (50 men x 70 weeks x 0.5 hours/week x \$28.62/hour). Ample evidence exists that extended overtime results in a marked loss in productivity, however there is less evidence found relative to production levels with four - 10 hour days v. five – 8 hour days. *The maximum projected saving to the project for requiring a project-wide use of four – 10’s would be \$50,085.*

c. Second and Third Shift – In the first instance, the prevailing wage rate determination of the Department of Labor will establish the shift differential rates. Although the Department’s stance seems to be flexible with regard to working conditions and policy, these rulings will likely come on a case by case basis. In any case, given the nature of the courthouse project there is little expectation that there will be any multiple shift work, *therefore there is no projected saving to the project for such a concession.*

d. Overtime and Make-up Days – There is little expected overtime for this project that would fall outside the standard time and a half. Weekend work will be virtually non-existent. The concession of Saturday make-up days in the event of weather related loss of a weekday is already allowed in several key trade agreements. The use of this make-up in the short term may improve production in a particular situation. The long-term use of such a clause will likely result in the overall loss of morale, hence production and efficiency. As such *there is little expected use for such a clause and therefore no saving that could be estimated for such a concession.*

e. Holidays – The holidays are not paid for the bulk of the trades, with the exception of the operating engineers, who are paid for six holidays. Since it is reported that other PLAs have removed all paid holidays, one could project that the Operating Engineers

would agree to such a concession. Further, this presumes that the labor department would agree with the modification. Mr. Intschert made it clear that a PLA would include uniformity of holiday pay, allowing an inference that the paid holidays would be conceded by the operating engineers. It could then be projected that on average, over the life of the project, there would be three men in this trade classification. *With eight holidays falling within the duration of the project, the estimated savings would be approximately \$6,700.*

f. Apprentice Ratios – There is no established policy on the apprentice ratios that would provide guidance to estimate the impact on project cost. It has been held by some of those that offered comments during the course of this investigation, that the use of apprentices, due to various factors is at best an economic offset of construction performance. The general position was that lower production and higher re-work were two balancing factors for the lower wages paid. *There is no advantage to be documented; hence no cost savings that can be projected from apprentice concessions.*

g. Worker's Compensation ADR – While it is beyond the scope of this report to conduct a detailed evaluation of the cost savings that a formalized dispute resolution process would offer, certain projections are possible. The typically presented cost savings that would accrue to any contractor for such an ADR clause, would be in the form of “non-guaranteed” dividend refund based upon individual contractor performance. The way this program would work is that through the enactment of an “alternative dispute resolution” (ADR) program for workers compensation matters, a more favorable loss record may be achieved. Such an improvement in the loss record over time could result in a larger dividend refund to the contractor, after the fact. With multiple contractors, on a short duration project, with many other construction contracts underway, not covered by this PLA or special ADR clauses, projected bid price savings are largely illusory. The belief that any contractor would, at the time of his bid preparation, include as a reduction in cost, some unspecified dividend refund that he/she may or may not receive, well after the work on this project is completed, is at best naïve. There is no basis or logic in suggesting any reasonable expectation of cost savings to the owner for such a clause. While this is not an opinion of the value of such a clause, it is an opinion of whether the County may reasonably expect an economic benefit from the ADR clause at the time of

bidding. *Based upon this assessment, there are no projected savings that could reasonably be expected within the bids for the project.*

h. Management Rights – There is no saving that can be estimated from the adjustment of management rights. While there is anecdotal evidence that costs would increase with a PLA, through diminishing merit shop management rights, this is impossible to estimate with any sense of accuracy. *Therefore, no savings or costs are predicted with this factor, either favoring or opposing a PLA.*

i. High Quality Construction – The experiences of this investigation have found that the quality of construction is generally a function of individual workers and the respective management groups. Offsetting arguments are that higher trained workers from the unions offer better overall quality, while merit shop contractors argue that cohesive and coordinated teams of craftsmen, many former union members, who work together on project after project, produce more favorable products. There is no way to predict the outcome of this debate, without the specific selection and evaluation of the contractor and workforce prior to bid. This issue of project quality then falls back to the responsibility of the architect and construction manager. *There is no prediction of cost or savings, with or without the PLA, pitting union affiliate workers against merit shop workers; such an evaluation would yield no meaningful result.*

j. Loss of Bidders – Others have conducted significant research on the number of bids received and the cost of a project (deviation from the budget). Additionally, many projects have found owners and non-union contractors at odds over the legality of the use of Project Labor Agreements. It seems that as these opponent's positions' become entrenched over the basic right of an owner to use a PLA, matters begin to deteriorate. Some reports seem to revolve around owner's reacting defensively to being pressured by having others (bidders) attempt to influence, and even impose the bidding rules. Positions seem to take on an attitude of "if a non-union contractor is 'disinclined to accept the terms of a PLA (it) does not imply any favoritism on the (owner's) part toward those bidders who do not share that disinclination.'" This "attitude" may be far from the "legitimate business" purpose for a PLA. The question is not "so what, if you don't want to bid by our rules, don't bid." The goal should be to complete the project for "the lowest price practicable" and "to obtain the best economic result for the public" while meeting the "quality, fitness and capacity... of the proposed work." The question for the owner

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should then be; how do we accomplish this set of goals; with the enactment of a PLA, or through a decision to forego the use of a PLA.

There are various reasons non-union contractors are reluctant to bid on projects that contain PLAs. The need to adapt to union work rules, the lack of ability to keep core workers employed and the potential for disruption of other work being performed on non-PLA projects, are each cited as adding to the hesitancy of non-union firms to bid on PLA projects. Certainly, as many studies have established, and with a basic understanding of the business, it is the right of any bidder to pick and chose the projects they bid. It is however the duty of those who set the procedures for procurement to establish a protocol that will result in the 'guard against favoritism, extravagance, fraud and corruption, to prevent the waste of public funds, and to obtain the best economic result for the public'. Generally, this is through maximization of bidder participation.

Through interviews conducted as a part of this investigation it has been made clear that at least four of the General Contractors who commonly bid on projects of this size, complexity and character will not participate in this project if a PLA is in place. The reasons were not emotional; each was based upon sound business judgment. In the HVAC and Plumbing trades one firm indicated that they would not participate. In the Electrical trades no merit shop firms were interviewed, and it is not uncommon to have a bidding group of only union electrical contractors for projects of this nature.

It is intuitively obvious that the larger the number of bidders, the greater the competition, and the higher the probability of obtaining "the best economic result for the public." This has generally been intuitive only, with little scientific based research to determine if it is in fact true. Several projects have been subjected to such research; to determine if there is a true correlation between the number of bidders and the resultant bid price, relative to the project budget.

The Roswell Park project in Buffalo was at the center of a PLA issue several years ago. A study was conducted to determine if there was such a correlation; number of bidders' impact on bid prices. It was found that there existed a significant correlation between the number of project bidders and the bid price variance. This study suggested the rate of cost increase for each bidder lost is approximately 3.45%.

A thorough review of the Jefferson County project was also conducted. By evaluating a number of different projects, the cost of the work, the project budget and the

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number of bidders, it can be determined if there is any relationship between these factors, and what that relationship is.

A study of 53 project bids, representing works throughout the market area serviced by the contractors that would likely participate in the bidding on the courthouse project, was undertaken. A correlation analysis of this data was performed. The results of this analysis are presented below and indicate that there is indeed a statistically significant relationship between the number of bidders on a project and the cost of the project relative to the project budget.

Correlations

		Bidders	Deviation
Number of Bidders	Pearson Correlation	1.000	-.347
	Sig. (2-tailed)	.	.011
	N	53	53
Deviation from Budget	Pearson Correlation	-.347	1.000
	Sig. (2-tailed)	.011	.
	N	53	53

* Correlation is significant at the 0.05 level (2-tailed).

This correlation indicates that of the 53 project bids investigated there is a 98.9% chance ($1.000 - 0.011$) that the relationship between these two factors did not occur by chance alone. It also indicates that the relationship is a negative correlation, (-0.347). This negative correlation indicates the higher the number of bidders participating, the lower the bid price.

The next question becomes, what is the relationship and what is the prediction of the impact on the cost, if any on the county project. The data is then subjected to a linear regression analysis to determine the "predictive" impact of this relationship. The regression will tell what the rate of decrease in project cost may be expected for each additional bidder. Or, in other words, if there were a loss of a bidder, what would be the predicted impact on the project's budget. The regression data is presented below:

ANOVA

Model		F	Sig.
1	Regression	6.995	.011

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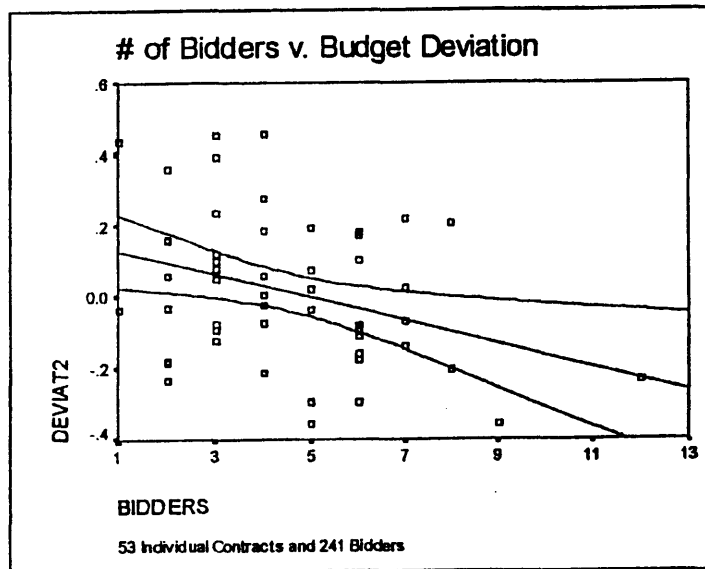
REGRESSION MODEL

Model		Coefficients		Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.159	.062		2.590	.012
	BIDDERS	-3.228E-02	.012	-.347	-2.645	.011

a. Dependent Variable: DEVIAT2

The regression model tells us that the impact for each bidder that is lost from the competition will result in a 3.228% increase in project cost. This evaluation sample represents 53 separate contracts, with bids representing the results of 241 bidders.

An evaluation of this data may then be made relative to the current project. The



first effort would be to project how many bidders, and who they might be in each of the prime contracts. It was determined for the present investigation to compare the County Courthouse Complex to the recent major construction project in the City of Watertown. That project, the Watertown City School District's Case Junior High

School, is similar in scope and nature, and would likely attract a bidding group similar to that which may be expected on the County Complex.

The following breakdown shows, by prime bidding contracts those that participated on the Junior High School project.

	General Construction		Mechanical Construction		Plumbing		Electrical Construction	
1	A. R. Mack	Union	Lawman	Merit	Lawman	Merit	S & L Electric	Union
2	Bette and Cring	Merit	Brosh Mechanical	Union	Brosh Mechanical	Union	Collins-Hammond	Union
3	Northland Associates	Merit	AirTech *	Merit	J & A Mechanicals	Union	O'Connell Electric	Union
4	Welliver-McGuire	Union	Tougher Industries	Union	M & N Plumbing	Union	Lawman	Union
5	Purcell Construction	Merit	J & A Mechanicals	Union	Jareo Associates	Union	Watson Electric	Union
6	Structural Associates	Merit	Jareo Associates	Union	Belucci Enterprise	Union	Burns Electric	Union
7	Murnane Building	Union	M & N Plumbing	Union	Norwood Plumbing	Union	New Century Electric	Union
8			* No longer in business				Jareo Associates	Union

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The analysis further allows for the estimation of the cost increase for the withdrawal of certain contractors from the bidding, as a result of the enactment of a Project Labor Agreement. The following breakdown presents the cost implication if those merit shop bidders (in business today) were to refuse to participate in the project. That would remove four General Contractors, one HVAC Contractor and one Plumbing Contractor. The Electrical Contractors in this area, on this size project are by and large union affiliated.

Loss of Bidders
Impact

General Construction	4	Mechanical Construction	1	Plumbing	1	Electrical Construction	0
Budget							
\$ 6,798,000		\$ 1,320,000		\$ 1,078,000		\$ 1,639,000	
12.92%		3.23%		3.23%		0.00%	
\$ 878,029.68		\$ 42,622.80		\$ 34,808.62		\$ -	
						\$ 955,461.10	

For the current study that would suggest a 12.92% increase in the general construction project cost and a 3.23% increase in the plumbing and HVAC contracts. *These cost increases approximate \$955,000.*

There are several issues to be considered. Upon review of the probable bidders for this type of project, is it reasonable to assume that without a PLA union contractors and their employees will be excluded from the competition? Clearly from the Watertown School project, without a PLA in place there was substantial participation by the union firms. Eighty percent of the bidders were those with union affiliation. The successful bidders on this particular project are all union contractors.

The actual conditions that will exist at bid time are impossible to predict, however there is substantial logic to the argument that certain, highly competitive local contractors will exclude themselves from the bidding with the enactment of a PLA. The absence of a PLA however will neither discourage nor effectively exclude any bidder.

A decision to proceed without a PLA will maintain a balance in the existing competitive bidding market, yielding the County the maximum competition, likely to produce "the best economic result for the public."

11. Conclusions

The following conclusions may be drawn from this investigation:

1. There is substantial evidence that the enactment of a PLA on the Jefferson County Courthouse Project will reduce the number of contractors and sub-contractors willing to participate in the work.
2. The reduction in the number of bidders, particularly in the current building market will have a marked negative impact on the overall cost of the work.
3. The additional costs estimated with the use of a PLA could range upwards of \$955,000. With the loss of even one General Contractor from the bidding, the cost increase could approach \$200,000.
4. With the enactment of a PLA there are few quantifiable cost savings associated with concessions in Labor Agreements, already quite lean with years of high-level labor/management cooperation. Concessions for the relief on holiday pay to the operating engineers is one quantifiable cost saving. This along with the opportunity for using flexible hours offers a potential saving of \$57,000.
5. It should be absolutely clear that participation on the project by union labor is not a factor in the projected increased cost of this project. Fair wages, whether paid to union trades persons or non-union workers make little difference in the cost of the project. Highly skilled and well trained workers are welcome participants on this work. The attraction by the county of all potential competitors is the key economic factor influencing the project's economic performance, not concessions from the workmen and women.

In conclusion there is little evidence of any measurable cost saving to the project through the use of a Project Labor Agreement. The effective "restriction on competition" through the use of a PLA on this particular project could add to the project a substantial cost.

With the use of a Project Labor Agreement on the Jefferson County Courthouse Project it is the conclusion of this report that the costs of construction for the completion of this work will increase. It is the finding of this study that there were no compelling reasons supporting a "reasonable business purpose" to suggest the adoption of a PLA for the Courthouse Complex.

A Project Labor Agreement is not recommended.

Jefferson County Courthouse Complex Project Labor Agreement Evaluation

Prepared by:
Paul G. Carr, P.E.
Engineering and Management Consultant

Outline of Presentation

- Project Labor Agreement - Rules for Use
- Scope of the Project
- Labor Needs
- Adequacy of the Local Labor Market
- Labor Workforce - What Constitutes Local
- Project Wage and Conditions Implication
- Legitimate Business Purpose - Public Bids
- Benefit/Cost Considerations

THE RULES:

1. When considering a *PLA* there must be a "*legitimate business purpose*" for an agreement.
2. And, to ensure Competitive Bids, which are...

1. To 'guard against favoritism, extravagance, fraud and corruption, to prevent the waste of public funds, and to obtain the best economic result for the public'; 'inviting competition'."
2. To 'secure the best work... for the lowest price practicable... and not for the enrichment of bidders.'
3. To 'stimulate advantageous marketplace competition' finding the 'lowest responsible bidder whose offer best responds in quality, fitness, and capacity to the particular requirements of the required work.'

Issues to be Considered

- Scope of the Project
 - New and Renovation Building Construction
 - 80,000 s.f. plus
 - \$ 14,000,000 Budget
 - Construction Period of 16 months
 - Spring 2001 - Fall 2002

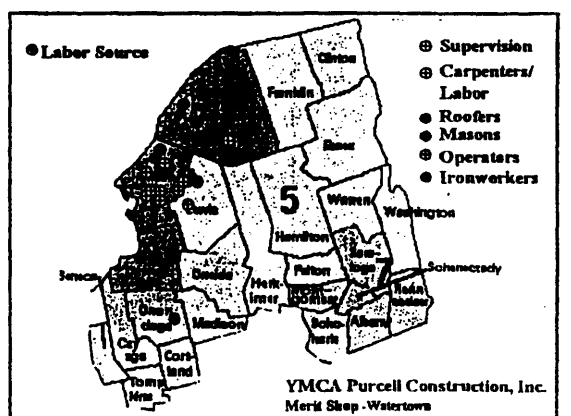
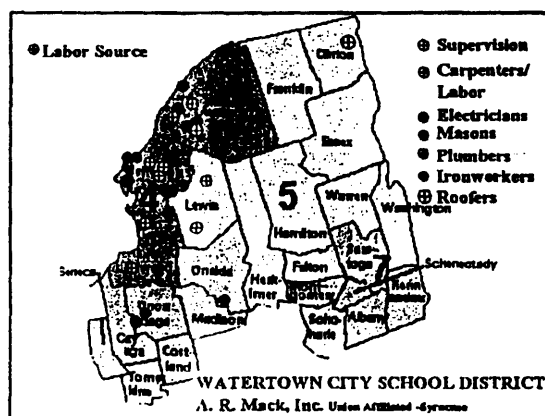
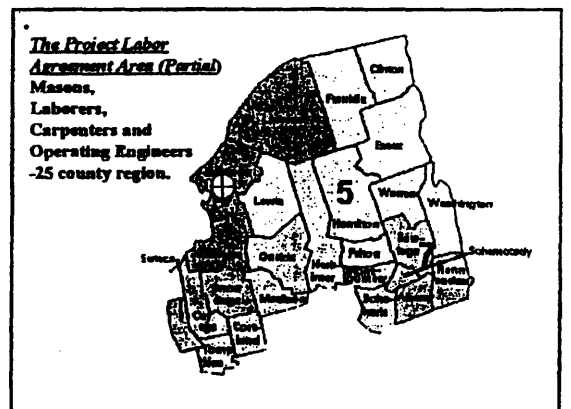
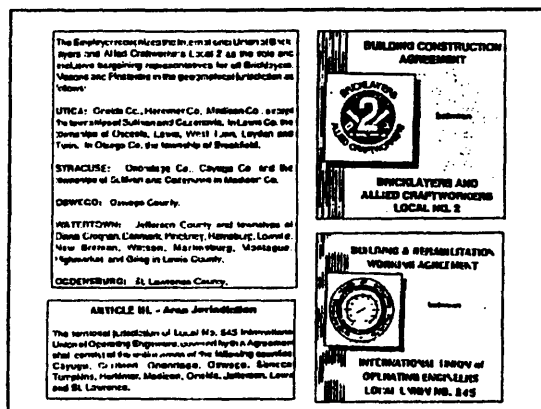
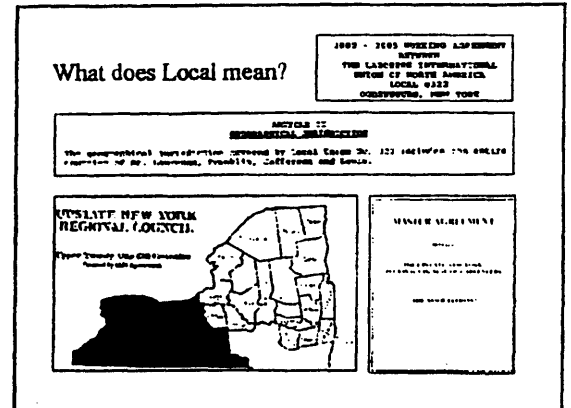
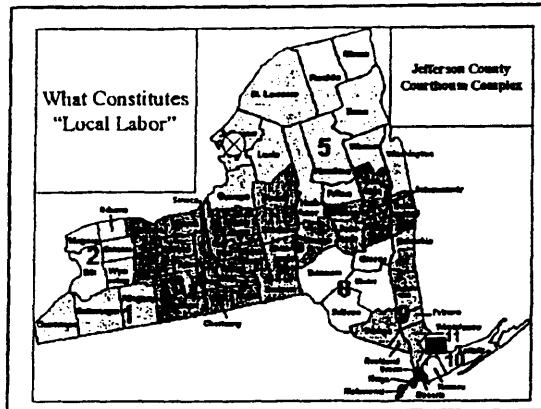
Issues to be Considered

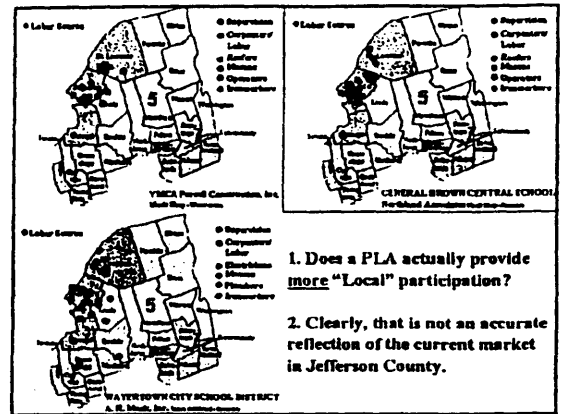
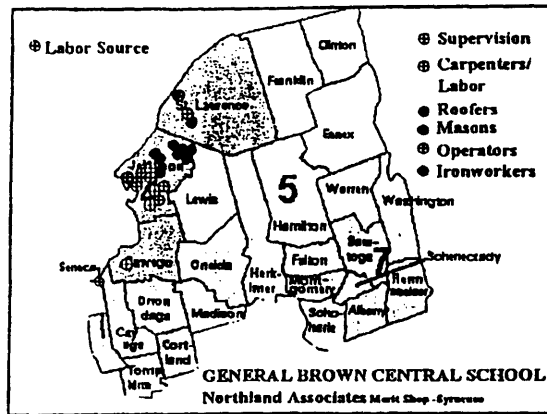
- Labor Needs
 - Building Trades Time > 140,000 hours
 - Carpenters, Masons, Laborers > 20,000 hours
 - HVAC and Electricians > 10,000 hours
 - Iron Workers, Roofers, Painters, Plumbers, Equipment Operators, etc. < 7,500 hours

Is there an adequate workforce to meet the needs of the Jefferson County Courthouse Complex Labor requirements?

General Construction	Mechanical Construction	Plumbing	Electrical Construction
1. A. R. Hest	Union	Laborer	Union
2. Bels and Ong	Union	Brick Mechanical	Union
3. Harwood Associates	Union	Air Bach *	Union
4. Wadsworth	Union	Traylor Industries	Union
5. P. J. Construction	Union	J. & A. Mechanical	Union
6. S. J. Construction	Union	James Associates	Union
7. M. J. Construction	Union	M. J. H. Plumbing	Union
8. M. J. Construction	Union	M. J. H. Plumbing	Union

Watertown City School Project





1. Does a PLA actually provide more "Local" participation?
2. Clearly, that is not an accurate reflection of the current market in Jefferson County.

Some "Issues" to be Considered

1. Project Wage Implications
 - Are Fair Wages being paid if there is an open shop contractor?
2. Collective Bargaining Agreement Conditions
 - Will the PLA concessions and cost savings offer project stability?

Wages - Prevailing Wage Rates v. Union Wage Schedule (The example below is a comparison of carpenter wages and conditions)

2002-2003 JEFFERSON		JEFFERSON, J. F. WIS, AND ST. LAWRENCE (JFCA 778)	
Rate		Rate	
Plan - Carpet Layer	19.10	Carpenter	\$19.10
Engineer / Apprentice	18.10	Millwright	\$19.25
Labr	18.10	Millwright	\$19.60
Site driver (local)	18.10	Academic	\$1.25
Millwright	18.10	Academic	\$1.25
Driver Van	20.10	Academic	\$1.25
Driver Bicy	20.10	Academic	\$1.25
OVERTIME PAY: See (B, E, G) on OVERTIME PAGE		Academic	\$1.25
HOLIDAY PAY: See (B, E, G) on HOLIDAY PAGE		Academic	\$1.25
Concession: See (B, E, G) on HOLIDAY PAGE		Academic	\$1.25

Concession Example

"No Strike" Clauses are typical concessions within PLAs, however they are already in most Collective Bargaining Agreements

NO STRIKE - NO LOCKOUT

There shall be no strike or lockout. All disputes and grievances shall be settled under the terms of the Arbitration Clause, Article XI, in this Agreement.

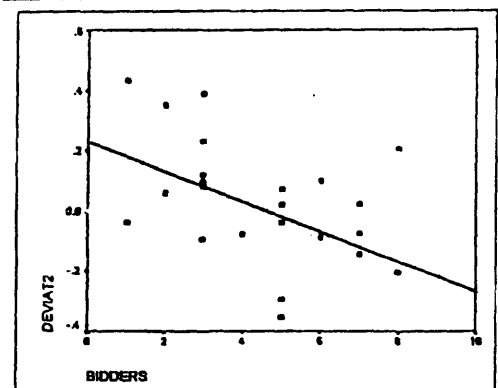
- Legitimate Business Purpose - Public Bids
- Benefit/Cost Considerations
 - No-Strike Protection (example given)
 - Regular work hours / shift concessions \$50,085
 - Make-up Days / Holidays \$6,700
 - Apprentice Ratios
 - Workers Compensation ADR
 - Management Rights and Quality of Work
 - Loss of Bidder Competition

Cost Issues to be Considered

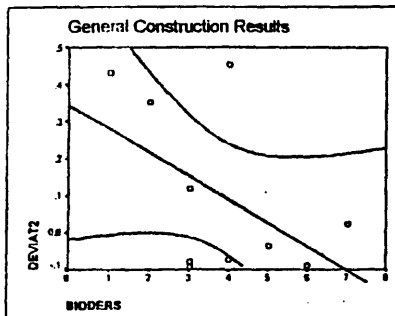
Is there a reasonable expectation that certain bidders would not bid the work?

General Construction	Mechanical Construction	Plumbing	Electrical Construction
1 A. R. Mack Union	Lowman	None	None
2 Shaw and Qing Union	Brush Mechanical Union	Brush Mechanical Union	None
3 Harwood Associates Union	Ad Tech *	None	None
4 Walston-McClure Union	Thatcher Industries Union	W & N Plumbing Union	None
5 Russell Construction Union	J & A Mechanicals Union	James Associates Union	None
6 Structural Associates Union	James Associates Union	Sublet of Structural Union	None
7 Hummer Building Union	W & N Plumbing Union	Harwood Plumbing Union	None
8	* No longer in business	James Associates Union	None

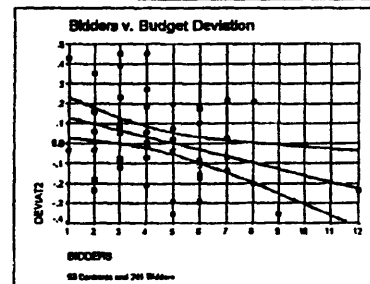
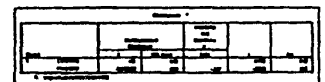
How do you analyze this impact on the project's cost, if the County loses bidders?



As the Number of Bidders Go Up the Prices Come Down



Statistical Plots of Bidder Loss



If the county were to lose 4 General Contractors, 1 Mechanical and 1 Plumbing Contractor we can predict the cost impact be on the Courthouse bids.

General Construction	Mechanical Construction	Plumbing	Electrical Construction
1 A. R. Mack Union	Brush Mechanical Union	Brush Mechanical Union	None
2	None	J & A Mechanicals Union	None
3	None	None	None
4 Walston-McClure Union	Thatcher Industries Union	W & N Plumbing Union	None
5	J & A Mechanicals Union	James Associates Union	None
6	James Associates Union	Sublet of Structural Union	None
7 Hummer Building Union	W & N Plumbing Union	Harwood Plumbing Union	None
8	* No longer in business	James Associates Union	None

General Construction	4	Mechanical Construction	1	Plumbing	1	Electrical Construction	0
Budget							
\$	6,786,000	\$	1,320,000	\$	1,075,000	\$	1,680,000
	12.92%		3.25%		3.25%		0.60%
\$	678,070.00	\$	42,072.00	\$	34,908.00	\$	93,481.00

Summary and Conclusion

- Summary of Considerations
 - There is no similar local experience indicating the effectiveness of a PLA's performance,
 - There is no evidence of a significant adverse impact on the county's operation due to schedule issues,
 - The consideration of a PLA is allowed under the law,
 - Labor organizations do have adequate skilled staff,
 - Work rule concessions are calculated to be \$56,785,
 - There is little history of local labor unrest in the area,
 - There is substantial evidence that a PLA would restrict competition.