

September 9, 1998

FAXED September 9, 1998

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RE: State Project No. 97870-3300
Fin. Project No. 251873-1-52-01
Contract No. 19,967
Dade County
State Road 821 (HEFT)
From Quail Roost Drive to SR 874

Subject: Alternate Traffic Control Dispute

Dear Sirs:

On August 25th and 26th, 1998, at the request of the Contractor, The de Moya Group, Inc. (DMG), and the Florida Department of Transportation (FDOT), the Disputes Review Board (DRB) held a hearing to consider the subject dispute. DMG and the FDOT presented certain testimony and copies of data prior to and during the hearing. Additional information was requested by the Board following the hearing and is incorporated into this review.

The Board was requested to determine "Entitlement" for the issues. Should Entitlement in favor of the Contractor be found, the parties would negotiate the time and value.

ISSUE:

Contractor submitted an alternate Traffic Control Plan (TCP) for review. The Department reviewed the alternate TCP and found it to be unacceptable. The Department directed the Contractor to proceed with the work utilizing the contract TCP. Is the Contractor entitled to additional compensation for complying with the Department's direction?

Department's Position:

Can The Contractor Bid On An Alternate TCP?

Yes. However if he elects to bid on elements outside the contract documents:

- He does so at his own risk.
- If he is successful, it is his good fortune.
- If he is unsuccessful then he must bear full responsibility for any resulting actions or consequences.

At no time does the Department encourage the Contractor to disregard the contract TCP in favor of an alternate TCP to perform his bid. An alternate TCP is not a contract document until it is approved by the Department.

...

Article 4-1 Intent of Contract: 1991 Standard Specifications.

"The intent is to provide for the construction and completion in every detail of the work described in the contract. The contractor shall furnish all labor, materials, equipment, tools, transportation and supplies, required to complete the work in accordance with the plans, specifications and terms of the contract."

Proposing An Alternate TCP.

- Must be signed and sealed by a professional engineer registered in the State of Florida.
- Must be prepared in conformance and in the manner outlined in the current version of The Roadway Plans Preparation Manual.
- Must be approved in writing by the Engineer prior to proceeding with it.

Subarticle 102-2.6 Alternative Traffic Control Plan:

"In the event that the contractor desires to make a conceptual change to the Traffic Control Plan, he may propose an alternative Traffic Control Plan to the plan presented in the contract documents ... The Traffic Control Plan shall be prepared in conformance with and in the form outlined in the current version of the Roadway Plans Preparation Manual ... In no case may the Contractor begin work using an alternate Traffic Control Plan until such plan has been approved in writing by the Engineer."

Reasons Why There Is No Entitlement Due

- The contractor claims he was allowed to bid the job using an alternate TCP. **The contractor is required to construct the project in accordance with the contract documents.**
- The Contractor can propose an alternate TCP, but was late in submitting his plan which encompassed the entire project.
- **The proposed Alternate TCP was not approved for deficiencies found in numerous areas.**
- Full consideration was made to approve the alternate TCP without compromising safety and quality.
- The Contractor refused to incorporate the Department's review comments to develop an acceptable Alternate TCP.

The Alternate TCP Was Found To Be Deficient For the Following Reasons:

26 Pages of review comments were generated from the initial review of the Alternate TCP.

- Their plan **did not have one 12' lane.**
- Their plan **did not have at least 2' of separation (offset) between the travel lane and the barrier wall.**
- Their plan for the barrier wall was **not at least 2' from a drop-off (deflection)**, nor was it anchored if less than 2"
- Their plan if taken as a whole had an **insufficient width from barrier wall to inside edge of pavement.** This is considered unsafe, and less than accepted standard minimums to properly and safely funnel traffic.
- The contractor **does not acceptably show how he is providing temporary lighting in his alternate TCP plan.**
- The contractor **does not acceptably address MOT for side street construction.** Significant due to:
 - Bridge Widening
 - Additional Lane Closures
 - Temporary Signalization
- The Contractor **proposed to lower the speed limit to 45 MPH** throughout the work zone. This is not in conformance with the RPPM.
- The alternate TCP provides Type "C" steady burning lights on top of temporary barrier walls at 50' O.C. This close spacing does not conform to standards and is not necessary.
- The alternate TCP **calls for grinding out or painting over existing pavement markings.** This can confuse the motorist because of discoloration, especially at night and in wet conditions. This method is not in accordance with the RPPM. Hydroblasting is the most effective method of removing pavement markings, and is the required method in the Contract.
- The Alternate TCP calls for placing temporary barrier wall on the saw cut edge of the work zone. **Due to this placement the required temporary wall gap 2' for drainage purposes will cause the outside of the barrier wall to be 4' into the construction of the widening.¹**

¹ The Contractor may need to show that the slots in the Barrier wall allow sufficient drainage.

The Contractor failed to submit an acceptable Alternate TCP in a timely manner. As a result the Department directed the contractor to proceed with the Contract TCP.

Contract TCP Meets The Requirements Of The RPPM

Due to space limitations, and based on engineering judgement, an exception was made during Phase IIA and IIB for a short section of the northbound lanes of SR 874 at the SR 874 exit from HEFT. This was done for the construction of asphaltic concrete overbuild within the gore area.

11 FT Lane Comparison

	Contract TCP	Alternate TCP
Length	0.37 Miles	3.94 Miles
Time	15%	100%

Lateral Clearance (Barrier Wall Offset)

	Contract TCP	Alternate TCP
Length	0.25 Miles	3.94 Miles
Time	15%	100%

Deflection Distance (BW to Dropoff)

	Contract TCP	Alternate TCP
Length	0.18 Miles	3.94 Miles
Time	15%	100%

The three main design elements related to the dispute are cross-sectional elements which when considered together have a cumulative effect on the project safety. The three elements are (1) the requirement for one 12 foot lane, (2) the requirement for a barrier wall buffer to the travelway and (3) the requirement for offset or anchorage from the barrier wall to the drop-off.

The Introduction Section of the current RPPM (page I-2) discusses the application of criteria outlined in the manual as follows:

“Roadway and structures design is primarily a matter of sound application of acceptable engineering criteria and standards. While the criteria contained in this manual provide a basis for uniform design practice for typical roadway design situations, precise standards which would apply to individual situations must rely on good engineering practice and analyses.

Situations will exist where these criteria will not apply. The inappropriate use of and adherence to these criteria does not exempt the engineer from the professional responsibility of developing an appropriate design. The engineer is responsible for identifying those criteria which may not apply to a particular design, and for obtaining the necessary exception or variation to achieve proper design.”

The Turnpike is a toll expressway designed to interstate standards. With the exception of toll collection facilities, the Turnpike Mainline is substantially equivalent to

The Turnpike is a toll expressway designed to interstate standards. With the

other interstate highways within the State with regard to traffic volumes and legally posted speeds.

The provision of one (1) twelve-foot lane as a general requirement of the project was the clear intent of the Contract TCP is supported by the RPPM and the Standard Index, is required by the standard specifications and is a requirement of any Alternative-TCP submitted by the Contractor for Department consideration.

The cumulative effect of design deficiencies must be considered in the evaluation of any design. Section 23.6 of the current RPPM discusses the documentation needed for Design Deviations. It states in part, that the evaluation of any design deviation consider (a) the cumulative effect of other deviations from design criteria and (b) safety mitigating measures.

The provision of desirable lateral clearances as a general requirement of the project was the clear intent of the Contract TCP, is supported by the Standard Indexes and AASHTO, is an important safety consideration, and is a requirement of any Alternative TCP submitted by the Contractor for Department consideration.

The Department requires the 2 foot offset wherever practical, which is provided by the Contract TCP and is a requirement of any Alternative TCP submitted by the Contractor for Department consideration.

It is the Department's position that the three cross-sectional issues of (1) the requirement for one 12 foot lane, (2) the requirement for a barrier wall buffer to the travelway and (3) the requirement for offset or anchorage from the barrier wall to the dropoff are cumulative and, **taken collectively, would result in an undesirable cross-section from a safety standpoint.**

INTERIM PLAN:

Placement of barrier wall at 4 ft. outside the edge of pavement, as opposed to placing barrier wall 6 ft. inside the edge of pavement as called for in the plans.

The Interim TCP was proposed as a Traffic Control Plan until this dispute is resolved.

REASONS FOR REJECTION

The Contractor has been directed to follow the contract TCP. The contract provides that the Contractor is to follow the direction of the Engineer during a dispute. The Contractor has refused to do so.

Implementation of the Interim TCP will require additional relocation of barrier wall not called for in the plans. **The Contractor has refused to provide the Department with a written statement that this additional relocation will be performed at no additional cost to FDOT.**

This plan disrupts the critical path in the present approved project schedule. This would require submittal of a revised schedule delineating a new critical path, which has not been submitted.

Contract Attachment Pages: Dispute Review Board, Page 1 Continuance of Work
During Dispute: "During the course of the dispute resolution process, the Contractor

will continue with the work as directed by the Engineer in a diligent manner and without delay.”

Subarticle 102-2.6 Alternate Traffic Control Plan, Second Paragraph, First Sentence:

“In no case may the contractor begin work using an alternate Traffic Control Plan until such plan has been approved in writing by the Engineer.”

The Contractor has failed to comply with the previous two specifications outlined. He has refused to follow the direction of the Engineer. By doing so, he continues to cause further delay to the project.

The FDOT TCP plan or other approvable (approved) TCP submitted by the Contractor can be implemented by the Contractor starting today. There would then be no need for their interim plan. No, **the plan is not approvable at this time** for several reasons, **one of which is cost. The additional cost is estimated to be \$350,000 for which the Contractor has said they expect payment.** The location of the wall is in an unacceptable location, but that will be addressed by the reviewers if and when the issue of payment is resolved. The Contractor has said they can complete 90% of the job using the interim plan. This has not been confirmed, and we believe this percentage to be exaggerated. Another reason is we do not see the benefit to the Department in implementing this interim plan.

FDOT Conclusion

The de Moya Group, Inc. is not entitled to additional compensation.

Contractor’s Position:

The contractor is **authorized** under the contract to **base its bid on an Alternate TCP that meets the requirements of the RPPM.** More specifically, the **Department has encouraged and requested contractors to be innovative in their approach to this project by bidding this project under the Department’s Innovative Contracting Procedures and the inclusion of Lane Rental, A+B bidding.**

The de Moya Group submitted an Alternate TCP which complies with the RPPM. The Department contends that the Alternate TCP does not comply with the RPPM regarding 11 foot lanes, 1 foot barrier wall offset, and deflection distance less than 2 feet. The Department is in error and the notebook of contract authority previously submitted by The de Moya Group is conclusive to this point.

The facts in this dispute are clear.

- 1) The Department requested innovative bids, the intent of which was to reduce the number of lane closures required to construct the project for the benefit of the public.
- 2) All contractors were innovative and significantly reduced the required lane closures utilizing Alternate Traffic Control Plans.
- 3) The contractors were **authorized to base their bid on an Alternate TCP that meets the requirements of the RPPM.**
- 4) **The dMG Alternate TCP exceeds the requirements of the RPPM.**

- 5) The dMG Alternate TCP provides an acceptable Level of Service "D".
- 6) The dMG Interim TCP exceeds the requirements of the RPPM.
- 7) The dMG Interim TCP provides an acceptable Level of Service "D" (Approaching LOS "C"). This is the same level of service provided by the existing facility.
- 8) The FDOT Plan TCP does not meet the requirements of the RPPM.
- 9) The FDOT Plan TCP provides an unacceptable Level of Service "F".
- 10) The Department's rejection of the dMG Alternate TCP and Interim TCP is arbitrary, inconsistent with its own review of the FDOT Plan TCP, and not supported by the contract documents.
- 11) The conditions that form the basis for the Department's rejection of the dMG Alternate TCP are also present in the FDOT Plan TCP.
- 12) If the Department were correct that the dMG Alternate TCP does not meet the requirements of the RPPM, then the FDOT Plan TCP does not meet these same requirements. In either case the Department remains responsible for delaying the project by virtue of its wrongful rejection of the dMG Alternate/Interim TCPs or due to its own deficient Plan TCP.

The Department has failed to identify one contract document that supports its arbitrary and wrongful rejection of the dMG Alternate TCP. The Department has failed to identify one contract document that supports its arbitrary and wrongful rejection of the dMG Interim TCP. The Department has failed to identify the contract documents that support their position that the Plan TCP complies with the RPPM regarding allowable lane closures. The dMG Alternate TCP and Interim TCP exceed the requirements of the RPPM and both are superior to the Plan TCP in Level of Service provided and Safety.

The contract is specific as to the applicable standards for alternate TCPs (RPPM). The contract does not provide for the Department's rejection of alternate TCPs based on the unstandardized opinions of its employees who differ from project to project. Otherwise, the Department's project management **staff would have the unbridled power** to approve or reject any TCP and as such, **undermining an essential element of the competitive bid system**, uniform requirements.

The **Alternate TCP meets the requirements of the RPPM** as it relates to the three main conditions that form the basis of the Department's rejection of said RCP?

The three conditions are:

- Lane Widths (minimum 1 @ 12')
- Barrier Wall Offset (minimum 2')
- Barrier Wall Deflection (minimum 2')

Lane Widths (Minimum 1 @ 12')

The RPPM, Chapter 10, Page I-10-35 specifically addresses minimum lane widths. The **minimum lane width specified in the RPPM "shall be 10 feet for all roadways other than Interstate"** (dMG Exhibit 1, Section 14). **However**, the

roadways other than Interstate" (dMG Exhibit 1, Section 14). **However**, the

referenced 1994 Roadway and **Traffic Design Standards specifies a minimum lane width of 11 feet for freeways** (dMG Exhibit 1, Section 13, Page 3 of 10).

- The definition of a freeway is indicated in the RPPM, Chapter 2, Page 20 (dMG Exhibit 1, Section 14). **The Homestead Extension of the Florida Turnpike is a freeway, not an interstate.**
- Furthermore the Plan TCP does not provide one 12' lane in Phase IIA (Plan Sheets 289, 290).
- The de Moya Group has provided clear and convincing evidence in the form of contract requirements that proves that 11' lanes are authorized under the contract.
- The Department has failed to provide any contract authority that identifies the Turnpike as an interstate highway thereby requiring one 12' lane per Standard Index 600, Page 3 of 10.

Barrier Wall Offset (Minimum 2')

The Roadway and Traffic Design Standards, Standard Index 600, Page 5 of 10, addresses barrier wall offsets and 0' is allowable (dMB Exhibit 1, Section 13).

- The Alternate TCP provides 1'.
- The Plan TCP provides 0' in a four-11' lane section without shoulders on Plan Sheets 289 and 290.
- The de Moya Group has provided clear and convincing evidence in the form of contract requirements that prove that a 1' barrier wall offset is authorized under the contract.
- The Department has acknowledged this position.

Barrier Wall Deflection (Minimum 2')

The "current" version of the RPPM is the 1989 English Version with updates through April 1995.

Neither the RPPM nor any other contract document address barrier wall deflection and the additional requirement urged by the Department that it be a minimum of 2'.

The de Moya Group has provided clear and convincing evidence that proves that a barrier wall deflection of 0' is authorized under the contract.

- The FDOT Plan TCP provides 0' deflection on Plan Sheets 274, 275, 277, 278, 280, 282, 283, 289, 290, 292, 294, and 296 (dMG Exhibit #1, Section 8).
- The Department has referenced other "metric versions" of the RPPM that are not a part of this contract. The later "1998 metric version" provides a reference to additional ground mount requirements if the deflection distance is less than 2'. The document referenced is Standard Index 0415 (dMG Exhibit #1, Section 12).
- In either case dMG stated in its letter dated May 1, 1998 (dMG Exhibit #1, Section 3) that the **barrier wall would be ground mounted in accordance with Standard Index 0415** and therefore there is no dispute on this issue.

Section 3) that the barrier wall would be ground mounted in accordance with **Standard Index 0415** and therefore there is no dispute on this issue.

de Moya Conclusion

- The Department's rejection of the dMG Alternate TCP based on the three main conditions is without contract authority. **Eleven foot lane widths, one foot barrier wall offset and zero foot deflection is not only authorized under the contract but present in the FDOT Plan TCP.** The Department's presentation indicated that the areas in the FDOT Plan TCP that included no 12' lanes, 0' barrier wall offset and 0' deflection distance were an exception. However, the Department failed to advise all bidders of this and as such the exception is not a part of the contract.
- The de Moya Group has provided clear and convincing evidence that the Department's rejection of the dMG Alternate TCP was without contract authority.
- The de Moya Group is entitled to additional compensation and time for all delays and any additional requirements to the dMG Alternate TCP that the Department directs dMG to implement.

The dMG **Interim TCP** meets the requirements of the RPPM? Is the Interim TCP an enhancement to the FDOT Plan TCP?

In response to the Department's rejection of the conceptual dMG Alternate TCP, dMG provided the Department the dMG Interim RCP. On April 28, 1998, signed and sealed plans were provided by the de Moya Group. The Interim TCP maintained all existing traffic patterns and further exceeded the various enhancements that the Department requested.

- Three 12' Lanes
- 4' Barrier Wall Offset
- 6' Deflection Distance
- 12' Full Width Median Shoulder

The Department refused to pay for the barrier wall placement even though it was serving its intended purpose. As a result of the de Moya Group's efforts, the project proceeded under the dMG Interim TCP without delay.

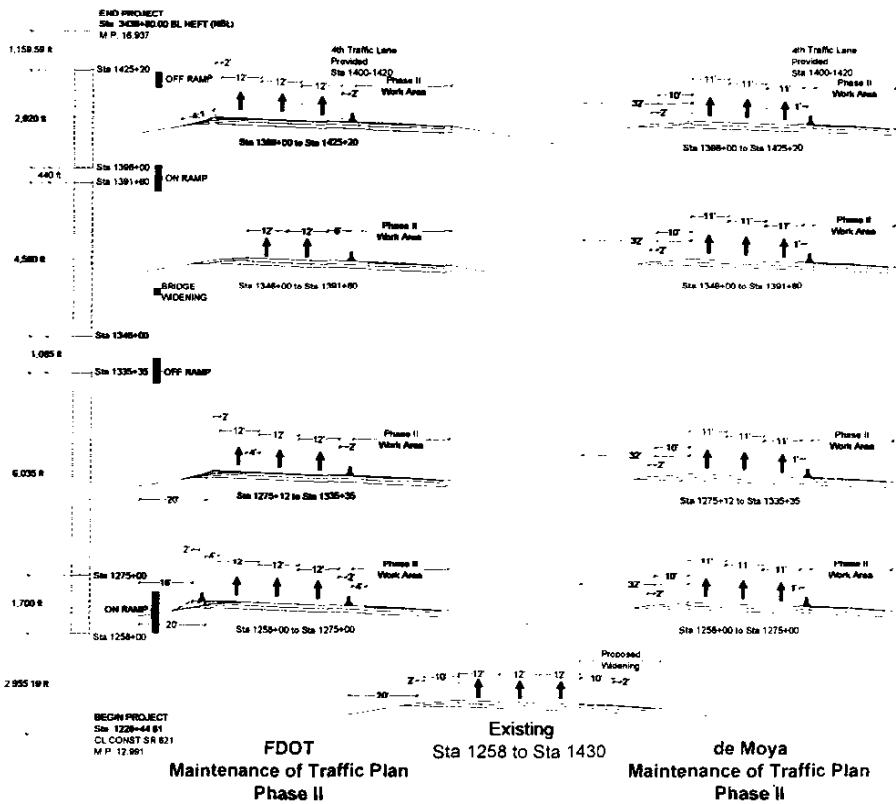
de Moya Conclusion

- The dMG Interim TCP exceeds all contract requirements and the Department's rejection of this TCP and Stop Work Order was without contract authority.
- The de Moya Group is entitled to additional compensation and time for all delays due to the Departments breach of its duties and responsibilities under the contract.
- The de Moya Group is entitled to payment for all barrier wall placed as per the dMG Interim TCP due to the deficient FDOT Plan TCP and unauthorized rejection of the dMG Alternate TCP.
- The de Moya Group is also entitled to payment for the final relocation of barrier wall due to the Department's deficient Plan TCP and its unauthorized rejection of the dMG Alternate, Interim and FHP TCPs.

DISPUTE REVIEW BOARD DECISION

- An Alternate TCP is authorized in the contract documents and as such conforms with the Intent of Contract.
- The Department is obligated by the Contract Documents to be reasonable in its review of Alternate Traffic Control Plans. The Department is obligated by the Contract Documents to approve Alternate Traffic Control Plans which are in compliance with the contract requirements. It is a breach of the Department's obligation to act in good faith if it disregards specifically identified contract standards (RPPM/Standard Specifications Section 102-2.6) which were relied upon by the de Moya Group in formulating its reduced bid for this project. Similarly, it is a breach of the Department's obligations to act in good faith if it arbitrarily applies different standards to evaluate the Plan TCP and the TCPs proposed by the de Moya Group. Contrary to the assertions made by the Department's staff, the Department does not have the discretion to reject Alternate TCPs and proposals by the Contractor which comply with the contract documents.

The Board understands that the dispute revolves principally around Phase II of the MOT plan as depicted below:



During Phase IIA there are 11' lanes allowed in the FDOT Plan beginning at approximately Sta. 1424+80, and the offset distance along the left inside lane HEFT (SR 821) from Sta. 1424+80 to 1433+80 is zero.

FINDINGS:

- The Contractor has the ability to submit an Alternate TCP whether or not the Lane Rental Specification is included in the Contract.
- The inclusion of the Lane Rental Specification encourages the Contractor to affirmatively seek methods to minimize/eliminate the closure of lanes. Whether inadvertently or by design this further encourages the Contractor to scrutinize the Plan TCP and submit and Alternate TCP.
- An Alternate TCP that meets the established requirements of the Contract may serve to reduce the cost of the various items at bid time that form the basis of the Contractor's bid.
- The Department has a duty to establish minimum requirements for the acceptance of Alternate Traffic Control Plans.
- The CPAM came closest to conveying the intent of the Department in saying:

*"The contractor has the option of using the Department designed TCP or proposing one of his own design at anytime. **If the contractor's proposed plan is equal to or better than the Department's plan and the cost is not greater, the alternative proposal will be given consideration according to Attachment 1"***
- However, the CPAM is not a part of the contract, nor is it referenced therein.
- This minimum was established in the RPPM.
- Although is not reasonable for the Contractor to believe that the project was not designed to Interstate standards, there appears to be a "hole" in the specifications in that the RPPM does differentiate between Interstate and other facilities.
- The Turnpike is part of the Intrastate system and **is not** an Interstate highway.
- There was no plan note or specification which notified the bidders that an Alternate Traffic Control Plan that met the minimum requirements would not be acceptable and enhancements thereto would be required.
- Absent a plan note or other specification the Contractor may have been misled into believing that meeting the minimum requirements of the RPPM was all that was required for approval of an Alternate TCP.
- A strict reading of the RPPM would lead one to believe that 10 foot lanes would be acceptable. This requirement was modified by the Contractor to 11' pursuant to Index 600.
- Absent any plan note that identifies it to be the exception to the rule, the inclusion of 11' lanes with zero offset in the FDOT plan does establish a precedent within the contract for the Contractor to believe that the same standard would be applicable to his plan.
- **TEMPORARY LIGHTING SCHEMATIC** on *Sheet Number 228* of the plans states.

*The following design is intended to provide continuous lighting in areas where existing luminaires are impacted by construction. **The contractor***

*The following design is intended to provide continuous lighting in areas where existing luminaires are impacted by construction. **The contractor***

DISPUTE REVIEW BOARD DECISION

may substitute the following design with his own design, at his own cost upon approval by the engineer provided that he maintains the same structural integrity, ease of maintenance and flexibility as the design shown, and that the quality of luminaires fulfills all noted requirements and meets lighting criteria requirements at all times. The contractor shall inspect the site and bring the existing lighting system to full operating conditions. The contractor can expect +/- 20% of luminaires not working.

Luminaires, when installed 36' on center shall provide the following illumination values on pavement 36' wide:

AVG.	6.6 F.C.
MAX.	11.6 F.C.
MIN.	1.2 F.C.
MAX/MIN.	9.69

- By leaving the existing lighting in place, it is incumbent on the Contractor to provide the Department information showing that by not installing a temporary lighting system his plan meets the above requirements.
- To date all requirements for a submission of a complete comprehensive alternate TCP have not been met. An Alternate TCP should address all phases necessary to construct the complete project. The Department is not required or obligated to approve an Alternate TCP piece meal. This conclusion is implicit in the specification stating:

"In no case may the contractor begin work using an alternate Traffic Control Plan until such plan has been approved in writing by the Engineer."

Recommendation:

Based upon the Board's review of all documents presented by both parties to this dispute, and additional documents requested after the hearing, it is our opinion that it is in the best interest of the parties as well as the Taxpayers of the State of Florida:

- That the Department, in collaboration with the Contractor, establish an acceptable revised Traffic Control Plan.
- That this plan contain all enhancements to the minimum requirements of the RPPM that the Department deems appropriate.
- That the Department negotiate an equitable adjustment to the Contract with the Contractor for such enhancements. This may of necessity also mean that the number of lane rental days be adjusted. The equitable adjustment should be net of cost included in the Contractor's bid.
- That the Interim TCP appears to be the most viable plan to keep the project on schedule. As long as this plan does not foreclose the implementation of the subsequent approved TCP plan and upon DMG addressing the Department's concerns as to completeness and approvability of the plan, that the plan be implemented. The initial placement of the Barrier Wall should be paid in accordance with the Contract. Subsequent relocation of this same Barrier Wall to the permanent position should not be eligible for payment.

...the permanent position should not be eligible for payment

DISPUTE REVIEW BOARD DECISION

It should be clearly understood by all parties that the Board takes no position as the appropriateness or quality of any Traffic Control Plan. This responsibility has and continues to lie with the Department and the Contractor as provided for in the Contract.

The Board appreciates the cooperation by all parties involved and the information provided to make this recommendation.

I certify that I participated in all of the meetings of the DRB regarding the Dispute indicated above and concur with the findings and recommendations.

Respectfully Submitted,

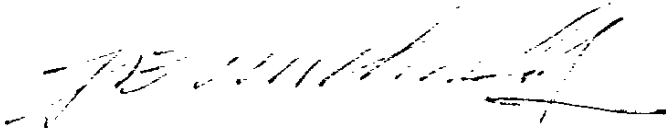
Disputes Review Board

J. B. Michael, Jr., DRB Chairman

John H. Duke, DRB Member

Warren Craven, DRB Member

SIGNED FOR AND WITH THE CONCURRENCE OF ALL MEMBERS:



J. B. Michael, Jr.

DRB Chairman

Enclosure: Exhibit 1

CC: Mario Rojas, P.E., FDOT

Armando de Moya, The de Moya Group, Inc.

Charles B. Wegman, P.E., FDOT

Pertinent Documents:

**FDOT Standard Specifications for Road and Bridge Construction,
1991 edition:**

*SECTION 102
MAINTENANCE OF TRAFFIC*

102-2 Specific Requirements.

102-2.2 Number of Traffic Lanes: Except as otherwise specified herein, on the plans, or in the special provisions, the Contractor shall maintain one lane of traffic in each direction. Two lanes of traffic in each direction shall be maintained at existing four (or more) lane cross roads, where necessary to avoid undue traffic congestion. Unless otherwise specified, the width of each lane used for maintenance of traffic shall be at least as wide as the traffic lanes existing in the area prior to commencement of construction. Traffic control and warning devices shall not encroach on lanes used for maintenance of traffic.

102-2.6 Alternative Traffic Control Plan: In the event that the Contractor desires to make a conceptual change to the Traffic Control Plan, he may propose an alternative Traffic Control Plan to the plan presented in the contract documents. The alternative plan shall be signed and sealed by an engineer registered in the State of Florida. The Traffic Control Plans shall be prepared in conformance with and in the form outlined in the current version of the Roadway Plans Preparation Manual. The plan will indicate a Traffic Control Plan for each phase of the Contractor's activities. ...

**FLORIDA DEPARTMENT OF TRANSPORTATION
LANE CLOSURE POLICY AND PROCEDURES**

GENERAL POLICY: No lane closure shall occur on the Turnpike unless all other possible alternatives have been explored and found to be not possible or practicable and that the reasons for the closure are warranted and documented. When above conditions are met, then closures can only during specified weekday non-peak hours or weekend hours and must be approved in advance by the Department.

II Department Work Program Construction Projects

- 1. Lane closure requirements within the limits of individual Department construction projects will be established during the development of Maintenance of Traffic (M.O.T.) plans for each project (or during the PD&E phase for large, complex projects). These will be developed using 24 hour counts to determine peak hour restrictions and will comply with the limitations of the other categories of work ...*

**FDOT OFFICE OF CONSTRUCTION
CONSTRUCTION PROJECT ADMINISTRATION MANUAL (CPAM)**

Chapter 6

Section 1: Maintenance of Traffic

Procedure

A. Selection of Traffic Control Plan

*A Traffic Control Plan (TCP) is included with each Department construction contract. The contractor has the option of using the Department designed TCP or proposing one of his own design at anytime. **If the contractor's proposed plan is equal to or better than the Department's plan and the cost is not greater, the alternative proposal will be given consideration according to Attachment 1. If accepted, the change will be documented by a supplemental agreement and revised plan drawings issued. The Department must approve the contractor's TCP prior to commencing affected activities.***

B. Discussion of Traffic Control Plan at Preconstruction Conference

*The TCP to be utilized on the project as detailed within the contract will be reviewed and discussed at the preconstruction conference. The review of the TCP shall consist of reviewing the different phases of work and provisions to maintain traffic during each phase. **Any errors or omissions shall be noted for corrective action at a later date....**²*

*The contractor will furnish a letter stating whether he plans to use the TCP in the plans. **The contractor may furnish the Engineer an alternate TCP at the preconstruction conference if he is not going to use the TCP in the plans. The alternate TCP shall be reviewed and discussed at the preconstruction conference but approval shall not be given until approved by the District Construction Engineer, who may consult with the District Traffic Operations Engineer. In no case will the Contractor begin work using an alternate Traffic Control Plan until such plan has been approved by the District Construction Engineer.***

Attachment 1: Approval of Modifications/Changes to TCP (Traffic Control Plan)

- A. Alternate TCP plans and any significant change to the original TCP requested by the contractor shall be submitted to the Resident Engineer in written form, signed and sealed by a Florida registered Professional Engineer....**

**PLANS
TEMPORARY LIGHTING SCHEMATIC**

Sheet Number 228

*The following design is intended to provide continuous lighting in areas where existing luminaires are impacted by construction. **The contractor may substitute the following design with his own design, at his own cost upon approval by the engineer provided that he maintains the same structural integrity, ease of maintenance and flexibility as the design shown, and that the***

² No testimony was presented at the DRB hearing that indicated that the Contractor felt that at the preconstruction conference that there were deficiencies in the plan MOT or that the plan did not meet the RPPM.

quality of luminaires fulfills all noted requirements and meets lighting criteria requirements at all times. The contractor shall inspect the site and bring the existing lighting system to full operating conditions. The contractor can expect +/- 20% of luminaires not working.

Luminaires, when installed 36' on center shall provide the following illumination values on pavement 36' wide:

AVG. 6.6 F.C.
MAX. 11.6 F.C.
MIN. 1.2 F.C.
MAX/MIN. 9.69

Luminaire shall be: Widelite Cat. #A2S-250C-M-DB-480-F or approved equal.

**DEPARTMENT OF TRANSPORTATION
SPECIAL PROVISIONS**

4. PREPARATION OF PROPOSALS. (REV. 4-29-97)

SUBARTICLE 2-5.1 (Page 10) is expanded by the following:

Included within the proposal for this Contract is a bid item for Lane Rental Days (LRD). The bidder shall determine the number of Lane Rental Days required to perform the work specified and show this number in the bid item in the proposal.

The following definitions will apply:

Lane Rental Day: *The time period during which the Contractor closes one or more lanes as permitted by the Contract. Time periods less than 15 minutes will not be considered in computing Lane Rental Days. The computation of Lane Rental Days will include moving operations. The number of lanes considered closed will be based on the number of lanes available prior to construction versus the number of lanes maintained through the project during any particular day. A lane is a mainline through lane or ramp.*

Lane Rental Days will be computed in full day and half day increments. A full day will be computed for any lane closure(s) or any combination of lane closures totaling over twelve hours in cumulative length over a 24 hour period. For purposes of computing Lane Rental Days, the 24 hour period shall be continuous and will begin when the Contractor begins the closure.

Computation of Lane Rental Days will continue until the closure is completely removed. A half-day will be computed for any lane closure(s) or any combination of lane closures totaling 12 hours or less cumulative in length within a 24 hour period. Lane Rental Days will not be charged for any day that contract time is not charged.

Daily Lane Rental Fee: *The full day Daily Lane Rental Fee is \$3,000.00 per lane per day. The half day Daily Lane Rental Fee is 50% of the full day Daily Lane Rental Fee. The lane rental items will only be shown on the lead project on contracts with multiple projects, but will cover work for all projects within the contract.*

7. **AWARD AND EXECUTION OF CONTRACT (REV. 4-11-97)**

ARTICLE 3-1 (Page 12). The first and second sentences are deleted and the following substituted:

For the purpose of award, each bid submitted shall consist of two parts whereby:

Standard Bid (A) = The correct summation of the products of the estimated quantities shown in the proposal, multiplied by their bid unit prices.

Time Bid (B) = [LRD times the Daily Lane Rental Fee] = the product of the number of Lane Rental Days (LRD) provided by the Contractor and the Daily Lane Rental Fee established by the Department.

The lowest evaluated bid (Total Bid) will be determined by the Department as the lowest sum of (A) plus (B) according to the following formula:

Total Bid = Standard Bid (A) + Time Bid (B)

The preceding formula will not be used to determine final payment to the Contractor. All payments will be based on quantities and bid unit prices.

The DBE utilization goals and bonding requirements will be applied to the Standard Bid ("A" portion) only.

17. **PAY ADJUSTMENT FOR DAILY LANE RENTAL. (REV. 4-29-97)**

SECTION 8 (Pages 58 – 72) is expanded by the following new Article:

8-15 Pay Adjustment For Fewer/More Lane Rental Days.

If the Contractor uses more Lane Rental Days than what was specified in the proposal, the Department will assess a per day fee equal to the Daily Lane Rental Fee. If the Contractor uses fewer Lane Rental Days than what was specified in the proposal, the Department will pay a per day incentive equal to the Daily Lane Rental Fee.

ROADWAY AND TRAFFIC DESIGN STANDARDS

Section 600 page 3 of 10:

LANE WIDTHS

Lane widths of through roadways should be maintained through work zone travel ways wherever practical. The minimum widths for work zone travel lanes shall be as follows: 11' for Interstate with at least one 12' lane provided each direction, unless formally excepted by the Federal Highway Administration; 11' for other freeways; and 10' for all other facilities.

ROADWAY PLANS PREPARATION MANUAL (RPPM)

Page 2-20:

5. ***Freeways:*** *Divided arterial highways, with full control of access. Movement of traffic free of interference and conflicts is of primary importance. Essential elements include medians, grade separations, interchanges, and in some cases, frontage roads. Freeways include Interstate, toll road and expressway systems. May be classified as urban or rural.*

rural.

Page I-10-7.0:

10.5 TCP Development

STEP #2 Develop Project Specific Objectives

What are your objectives? Examples might be:

- **use barrier wall to separate workers from traffic**
- close road if adequate detour exists
- **maintaining 2-way traffic at all times**
- **maintaining existing roadway capacity during peaks**
- maintaining business/resident access
- **provide bike/pedestrian access**
- minimize wetland impacts
- **expedite construction**

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10.15.6 Lane Widths

Existing lane widths of through roadways should be maintained through work zone travel ways wherever practical. The minimum widths for work zone travel lanes shall be 10' for all roadways other than Interstate. On Interstate highways the minimum width for work zone travel lanes shall be 11' except at least one 12' lane in each direction shall be provided.