LONG TERM PAVEMENT PERFORMANCE
PROGRAM DIRECTIVE

For the Technical Direction of the LTPP Program

Program Area: IMS **Directive Number**: I-66

Date: March 30, 1999 **Supersedes**: NA

Subject: LTPP Computed Parameters

"Section D - User Documentation on Computed Parameters" in "Part IX. Documentation for IMS Database Additions" in *LTPP Information Management System Standards and Conventions* has been revised. Attached is a copy of the replacement pages and a replacement *.pdf file which has the revised pages as well.

Replace page 34 in the hard copy versions with the revised pages on receipt. Destroy the existing copies of the original *.pdf file and replace them with the new one.

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Approved by:

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D. User Documentation on Computed Parameters

Document Description/Purpose

The purpose of LTPP Computer Parameters documentation is to provide users of the LTPP data base with sufficient information to create/generate a specific computed parameter resulting from LTPP data analysis.

Audience for Document

Users of the LTPP data base and the LTPP staff.

Content

An LTPP Computed Parameter Document should provide the following information:

- A description and flowchart of the calculation process;
- A listing of the inputs at the table or field level as appropriate. The listing should identify the IMS release, schema, data dictionary, and codes list in effect when initially computed for externally computed parameters;
- A description of any off-line LTPP data required;
- A discussion of any non-LTPP data required including how to acquire it;
- Identification of the correspondence between LTPP data elements and equation variables;
- A listing of all equations used in the calculations and the conditions for their application;
- A listing of all tables of constants used by the computations and when interpolation is allowed;
- Any defaults used in the calculations and the conditions under which they apply;
- A listing of any LTPP software which implements the algorithms; and
- A reference list with the relevant data collection protocols or research which apply to the inputs, outputs, or computational methodology.

Format

An LTPP Computed Parameter Template has been developed and is attached. In general an LTPP Computed Parameter document is to be approximately three to six pages in length.

Submission Guidelines

LTPP Computed Parameter text must be submitted in WordPerfect format; any accompanying graphics (i.e., graphs, charts, etc.) must be submitted in ".tif" format.

Review and Publication Process

The LTPP staff and/or appropriate other reviewers assigned by the staff will complete a technical review of the submitted computed parameter. When the technical content of the computed parameter has been finalized, it will be submitted to FHWA publications for editorial review. All technical content must be finalized before submission for editorial review. Once the computed parameter document has gone through FHWA's editorial review process, it will be returned to the author for final review to make certain that editorial review has not effected the technical content. Please note to provide timely publication of the computed parameter. Turnaround time for this review should be two weeks.

Upon receipt of the final reviewed computed parameter document from the author, the document will be submitted for HTML coding and upon completion will be posted to LTPP's Homepage in the data base section.

Distribution

The Computed parameters will be available electronically on the LTPP web site.

COMPUTED PARAMETER DOCUMENT TEMPLATE

Publication Number

This number will be assigned by FHWA.

FHWA Contact

The contact person will be assigned by FHWA. This will be the person that is most familiar with the parameter on a technical basis.

Introduction

A brief introduction to the computed parameter is to be provided in this section. Pertinent data elements in the LTPP data base related to the computed parameter are to be defined in this section.

Benefit

A statement on the usefulness of the computed parameter or its most common application is to be provided in this section.

Process Implementation

This section will provide a description of how the computed parameter is developed and what is needed to develop the parameter.

Analysis Steps

This section provides a step by step guide for creating the computed parameter – in essence the "how to."

Other information that would help the reader for better understanding of the computed parameters , such as an example, can also be included in the text.

Reference Information

In this section, the references to the author such as the company information as well as the FHWA contract reference (if applicable) will be included.