## Department of Human Resources & Examinations

**Louisiana State Licensing Board for Contractors** 



# Highway, Street and Bridge Construction

#### **Classification Description**

Allows a contractor to construct highways, streets, bridges and all related work as well as to perform general earthwork, and general paving such as sidewalks, driveways and parking lots.

### Introduction



<u>Highway, Street and Bridge Construction</u> is a closed book examination with 100 multiple-choice questions which are equally weighted. You will have **four hours** to complete this examination.

This bulletin contains only a sample of the many good references available which may be helpful in studying for the examination. This is not a comprehensive listing. Please note that it is not necessary to read all of the books in order to pass the examination. Rather, this list is intended to suggest what types of books might be useful in helping to acquire the basic knowledge needed to perform this type of work. We try to keep this list current with books in print, but some books go out of print from time to time. These books may be available in your local library's collection or through your local library by using the services of Inter-Library Loan.

If still in print, these books may also be available through your local bookstore or by contacting the publisher. All references available via the internet are followed by the appropriate website address for obtaining the reference. From time to time, website addresses may change and no longer be available. In such cases, please search for the appropriate new website address or contact the publisher or a library to obtain a copy.

#### **Content Outline**

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Construction Layout	6
Clearing, Grubbing, and Demolition	6
Drainage	8
Earthwork	12
Bridges and Structures	17
Soil Treatments and Base Courses	12
Concrete Pavement	12
Asphalt Pavement	12
Incidental Construction	7
Lights, Signs, Barricades, Traffic Control, and Safety	8
Devices	

#### References

<u>Concrete Pavement Field Reference: Pre-Paving;</u> American Concrete Pavement Association; Skokie, IL; 2008. <a href="https://netforum.avectra.com/eweb/Shopping.aspx?pager=1&cart=0&Site=ACPA\_ORG">https://netforum.avectra.com/eweb/Shopping.aspx?pager=1&cart=0&Site=ACPA\_ORG</a>

<u>Concrete Pavement Field Reference: Paving;</u> American Concrete Pavement Association; Skokie, IL; 2010. <a href="https://netforum.avectra.com/eweb/Shopping/Shopping.aspx?pager=0&cart=0&Site=ACPA\_ORG">https://netforum.avectra.com/eweb/Shopping/Shopping.aspx?pager=0&cart=0&Site=ACPA\_ORG</a>

<u>Culvert Repair Practices Manual</u>, Volume 1; Publication No. FHWA-RD-94-096; Ballinger, Craig A. and Drake, Patricia G.; Office of Engineering and Highway Operations R&D, Federal Highway Administration; McLean, VA; 1995.

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<u>Culvert Repair Practices Manual,</u> Volume 2; Publication No. FHWA-RD-95-089; Ballinger, Craig A. and Drake, Patricia G.; Office of Engineering and Highway Operations R&D, Federal Highway Administration; McLean, VA; 1995.

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<u>Developing Your Stormwater Pollution Prevention Plan: A Guide for Construction Sites;</u> U.S. Environmental Protection Agency; Washington, DC. Available at: <a href="https://www.epa.gov/npdes/pubs/sw-swppp-guide.pdf">www.epa.gov/npdes/pubs/sw-swppp-guide.pdf</a>

<u>Hoisting and Rigging Standard; U. S. Department of Energy; Washington, DC.</u> <u>http://energy.gov/ehss/downloads/doe-std-1090-2007</u>

Integrated Materials and Construction Practices for Concrete Pavement: A State-of-the-Practice Manual; Taylor, Peter C., et. al.; National Concrete Pavement Technology Center Center for Transportation Research and Education and the Federal Highway Administration, Office of Pavement Technology; Ames, IA.; 2004. http://www.cptechcenter.org/publications/imcp/index.cfm

<u>Hot-Mix Asphalt Paving Handbook;</u> by the U. S. Army Corps of Engineers and the U. S. Department of Transportation, Federal Aviation Administration; Washington, DC. <u>www.faa.gov/airports/resources/advisory\_circulars/index.cfm/go/document.information/documentNumber/150\_5370-14A</u>

<u>Louisiana Standard Specifications for Roads and Bridges;</u> State of Louisiana, Department of Transportation and Development; Baton Rouge, LA; 2006. <u>wwwsp.dotd.la.gov</u>

Managing Your Environmental Responsibilities: A Planning Guide for Construction and Development; Office of Compliance, Office of Enforcement and Compliance Assurance, U.S. Environmental Protection Agency; Washington, DC; 2005. <a href="https://www.epa.gov/compliance/resources/publications/assistance/sectors/constructmyer/myerguide.pdf">www.epa.gov/compliance/resources/publications/assistance/sectors/constructmyer/myerguide.pdf</a>

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<u>Pile Driving Equipment; Technical</u> Instructions 818-03; U. S. Army Corps of Engineers; Washington, DC; 1998. <u>www.wbdg.org/ccb/ARMYCOE/COETI/ARCHIVES/ti818\_03.pdf</u>

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Features, NCHRP Report 350; Ross, H. E., Jr., Sicking, D. L., et. al.; National Academy
Press; Washington, DC; 1993. Available at:
http://onlinepubs.trb.org/onlinepubs/nchrp/nchrp\_rpt\_350-a.pdf

<u>Safety and Health Regulations for Construction</u>; Code of Federal Regulations, Title 29, Part 1926; U. S. Department of Labor, Occupational Safety and Health Administration; Washington, D.C.; 2011. <a href="http://www.gpo.gov/fdsys/pkg/CFR-2011-title29-vol8/pdf/CFR-2011-title29-vol8/pdf">http://www.gpo.gov/fdsys/pkg/CFR-2011-title29-vol8/pdf</a>/CFR-2011-title29-vol8.pdf

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