

Introduction

The purpose of this report is to summarize results of a structural analysis performed on the 275 ft guyed tower to reflect the change in loading by T-Mobile.

Supporting Documents

Tower Drawings	PiRod Drawing # 110412-B dated September 29, 1987
Foundation Drawing	PiRod Drawing # 110412-B dated September 29, 1987
Geotechnical Report	GEOServices, LLC Project # 21-07254 dated April 27, 2008

Analysis

The tower was analyzed using American Tower Corporation's tower analysis software. This program considers an elastic three-dimensional model and second-order effects per ANSI/TIA-222.

Basic Wind Speed:	98 mph (3-Second Gust)
Basic Wind Speed w/ Ice:	40 mph (3-Second Gust) w/ 1" radial ice concurrent
Code:	ANSI/TIA-222-G / 2009 IBC / Maine Model Building Code
Structure Class:	II
Exposure Category:	В
Topographic Category:	1
Spectral Response:	$Ss = 0.25, S_1 = 0.08$
Site Class:	D - Stiff Soil

Conclusion

Based on the analysis results, the structure does not meet the requirements per the applicable codes listed above. The tower and foundation can support the equipment as described in this report after the modifications listed below are completed:

• Reinforce base foundation.

If you have any questions or require additional information, please contact American Tower via email at Engineering@americantower.com. Please include the American Tower site name, site number, and engineering number in the subject line for any questions.