

UNITED STATES SECURITIES AND EXCHANGE COMMISSION WASHINGTON, D.C. 20549

Mail Stop 3233

September 16, 2016

Via E-mail
A. William Stein
Chief Executive Officer
Digital Realty Trust, Inc. and Digital Realty Trust, L.P.
Four Embarcadero Center, Suite 3200
San Francisco, CA 94111

Re: Digital Realty Trust, Inc. and Digital Realty Trust, L.P. Form 10-K for the fiscal year ended December 31, 2015

Filed February 29, 2016 File No. 1-32336 and 0-54023

Dear Mr. Stein:

We have reviewed your filing and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to these comments within ten business days by providing the requested information or advise us as soon as possible when you will respond. If you do not believe our comments apply to your facts and circumstances, please tell us why in your response.

After reviewing your response to these comments, we may have additional comments.

Form 10-K for the year ended December 31, 2015

Note 3. Investments in Real Estate

Dispositions, page 128

- 1. We note that during 2014 you recorded impairment on five properties; three of which qualified as held-for-sale at December 31, 2014. Please clarify whether any of the properties sold during 2015 are among the five that were impaired during 2014. If so, tell us what factors changed between the time that the impairment was recognized and the time of sale.
- 2. We note your disclosure on page 71 that the five impaired properties did not meet the criteria to be classified as held-for-sale at December 31, 2014. Please advise.

A. William Stein Digital Realty Trust, Inc. and Digital Realty Trust, L.P. September 16, 2016 Page 2

Form 10-Q for the period ended June 30, 2016

Note 11. Equity and Accumulated Other Comprehensive Income, Net, page 37

3. Please tell us how you accounted for the forward equity sales related to the offering of shares of your common stock that occurred in July 2015 and May 2016. Cite all relevant accounting literature within your response.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes the information the Securities Exchange Act of 1934 and all applicable Exchange Act rules require. Since the company and its management are in possession of all facts relating to a company's disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

In responding to our comments, please provide a written statement from the company acknowledging that:

- the company is responsible for the adequacy and accuracy of the disclosure in the filing;
- staff comments or changes to disclosure in response to staff comments do not foreclose the Commission from taking any action with respect to the filing; and
- the company may not assert staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

You may contact William Demarest, Accountant at 202-551-3432 or me at 202-551-3856 if you have questions regarding comments on the financial statements and related matters. Please contact Folake Ayoola, Senior Attorney at 202-551-3673 or Charles Garrison, Special Counsel at 202-551-3466 with any other questions.

Sincerely,

/s/ Shannon Sobotka

Shannon Sobotka Staff Accountant Office of Real Estate & Commodities