

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
October 10, 2012**

**ORDER GRANTING CONFIDENTIAL TREATMENT
UNDER THE SECURITIES ACT OF 1933**

KYTHERA Biopharmaceuticals, Inc.

File No. 333-181476 - CF#28240

KYTHERA Biopharmaceuticals, Inc. submitted an application under Rule 406 requesting confidential treatment for information it excluded from the Exhibits to a Form S-1 registration statement filed on May 17, 2012, as amended.

Based on representations by KYTHERA Biopharmaceuticals, Inc. that this information qualifies as confidential commercial or financial information under the Freedom of Information Act, 5 U.S.C. 552(b)(4), the Division of Corporation Finance has determined not to publicly disclose it. Accordingly, excluded information from the following exhibits will not be released to the public for the time periods specified:

Exhibit 10.5(a)	through April 6, 2017
Exhibit 10.5(b)	through April 6, 2017
Exhibit 10.5(c)	through April 6, 2017
Exhibit 10.6(a)	through April 6, 2017
Exhibit 10.6(b)	through April 6, 2017
Exhibit 10.6(c)	through April 6, 2017
Exhibit 10.7(a)	through May 17, 2017
Exhibit 10.8(a)	through December 31, 2014
Exhibit 10.8(b)	through December 31, 2014
Exhibit 10.9	through May 17, 2017

For the Commission, by the Division of Corporation Finance, pursuant to delegated authority:

Jeffrey P. Riedler
Assistant Director