



XENON

XENON PHARMACEUTICALS INC.

NOTICE OF ANNUAL MEETING OF SHAREHOLDERS

NOTICE IS HEREBY GIVEN that the annual meeting (the “**Meeting**”) of the holders of common shares (“**Common Shares**”) of Xenon Pharmaceuticals Inc. (“**Xenon**” or the “**Corporation**”) will be held at the offices of the Corporation at #200 - 3650 Gilmore Way, Burnaby, British Columbia, on Thursday, June 2, 2016 at 9:00 a.m. (PDT) for the following purposes:

1. to receive the financial statements of the Corporation for the financial year ended December 31, 2015 and the report of the Corporation’s auditors thereon;
2. to elect as directors of the Corporation the eight nominees named in the accompanying Proxy Statement and Management Information Circular to hold office until the next annual meeting of the Corporation or until their successors are duly elected;
3. to appoint KPMG LLP as the Corporation’s auditors to hold office until the next annual meeting of the Corporation;
4. to authorize the Audit Committee of the board of directors of the Corporation to fix the remuneration to be paid to the auditors of the Corporation; and
5. to conduct such other business as may properly be brought before the Meeting or any adjournment thereof.

The accompanying Proxy Statement and Management Information Circular provides additional information as to the matters to be dealt with at the Meeting and is deemed to form a part of this Notice. Shareholders of record at the close of business on April 4, 2016 are entitled to receive notice of and to vote at the Meeting.

Registered shareholders who are unable to attend the Meeting in person and who wish to ensure that their Common Shares will be voted at the Meeting are requested to complete, date and execute the enclosed form of proxy and deliver it in accordance with the instructions set out in the form of proxy and in the Proxy Statement and Management Information Circular.

Proxies to be used at the Meeting must be received by American Stock Transfer & Trust Company, LLC, not later than 11:59 p.m. (EDT) on Wednesday, June 1, 2016 (or, if the Meeting is adjourned, not later than 48 hours, excluding Saturdays, Sundays and holidays, preceding the time of such adjourned Meeting). Proxies may be submitted by one of the following alternative methods:

By Internet: <http://www.voteproxy.com> and follow the on-screen instructions or scan the QR code provided on the form of proxy;

By Telephone: 1-800-PROXIES (1-800-776-9437) (toll-free in the United States and Canada) or 1-718-921-8500 and enter the 11 digit control number printed on the form of proxy;

By Email: Complete, date and sign your proxy and email a scanned copy to proxy@amstock.com;

By Fax: Complete, date and sign your proxy and fax a copy to 718-765-8730; or

By Mail: Complete, date and sign your proxy and mail a copy to American Stock Transfer & Trust Company, LLC, at 6201 15th Avenue, Brooklyn, NY 11219, United States.

If you hold your Common Shares in a brokerage account you are not a registered shareholder. Non-registered shareholders who plan to attend the Meeting must follow the instructions set out in the voting instruction form provided to them by their broker or other intermediary to ensure that their Common Shares will be voted at the Meeting.

DATED at Burnaby, British Columbia this 27th day of April, 2016.

By Order of the Board of Directors

/s/ Simon Pimstone

Simon N. Pimstone
President & Chief Executive Officer