

**CENTER FOR DRUG EVALUATION AND RESEARCH**

**APPLICATION NUMBER: NDA 20753**

**CORRESPONDENCE**

P Guinn

JEC 14 1998

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, Michigan 49001

Attention: John S. Walker  
Regulatory Affairs Manager

Dear Mr. Walker:

We have received your pre-submission of Preclinical and Pharmacokinetics/Bioavailability information for the following:

Name of Drug Product: exemestane tablets; 25 mg

Date of Application: November 30, 1998

Date of Receipt: December 1, 1998

Our Reference Number: 20-753

We will review this early submission as resources permit. We will not, however, consider it subject to a review clock or to a filing decision by FDA. Please cite the NDA number listed above at the top of the first page of any communications concerning this application.

If you have any questions, contact Patrick Guinn, Project Manager, at (301) 594-5657.

Sincerely,

/s/

for

Dotti Pease  
Chief, Project Management Staff  
Division of Oncologic Drug Products  
Office of Drug Evaluation I  
Center for Drug Evaluation and Research

Gunn

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, Michigan 49001

FEB 2 1999

Attention: John S. Walker  
Regulatory Manager, Regulatory Affairs

Dear Mr. Walker:

We have received your new drug application (NDA) submitted under section 505(b) of the Federal Food, Drug, and Cosmetic Act for the following:

Name of Drug Product: exemestane, tablets

Therapeutic Classification: Standard (S)

Date of Application: December 18, 1998

Date of Receipt: December 21, 1998

Our Reference Number: 20-753

Unless we notify you within 60 days of our receipt date that the application is not sufficiently complete to permit a substantive review, this application will be filed under section 505(b) of the Act on February 17, 1999 in accordance with 21 CFR 314.101(a). If the application is filed, the user fee goal date will be December 21, 1999.

Under 21 CFR 314.102(c) of the new drug regulations, you may request an informal conference with this Division (to be held approximately 90 days from the above receipt date) for a brief report on the status of the review but not on the application's ultimate approvability. Alternatively, you may choose to receive such a report by telephone.

Please cite the NDA number listed above at the top of the first page of any communications concerning this application. All communications concerning this NDA should be addressed as follows:

NDA 20-753

page 2

U.S. Postal Service:

Food and Drug Administration  
Center for Drug Evaluation and Research  
Division of Oncologic Drug Products, HFD-150

Attention:  
Division Document Room HFD-150  
5600 Fishers Lane  
Rockville, Maryland 20857

Courier/Overnight Mail:

Food and Drug Administration  
Center for Drug Evaluation and Research  
Division of Oncologic Drug Products, HFD-150

Attention:  
Division Document Room HFD-150  
1451 Rockville Pike  
Rockville, Maryland 20852-1420

If you have any questions, contact Patrick Guinn, Project Manager, at (301) 594-5767.

Sincerely,

/S/ 2-1-99

Dotti Pease  
Chief, Project Management Staff  
Division of Oncologic Drug Products  
Office of Drug Evaluation I  
Center for Drug Evaluation and Research

# USAN

American Medical Association  
515 North State Street  
Chicago, Illinois 60610

UNITED STATES ADOPTED NAMES COUNCIL

Telefax: 312-464-4184  
E-mail: Sophia\_Fuerst@ama-usan.org

SOPHIA V. FUERST, Associate Secretary  
(312) 464-5352

July 28, 1999

LL-46

Pharmacia & Upjohn, Inc.  
7000 Portage Road  
Kalamazoo, Michigan 49001-0199

Attn: Anthony Palmieri III, PhD  
Manager, Technology Protection

Dear Dr. Palmieri:

It is my pleasure to inform you that the USAN Council adopted exemestane as the United States Adopted Name for PNU-155971; FCE24304; Aromasin™. Pharmacia & Upjohn, Inc.'s antineoplastic aromatase inhibitor used in the treatment of advanced breast cancer.

Enclosed is a copy of the Statement of Adoption on exemestane. Please review this information for accuracy, initial, and return the statement to me within 45 days of the date listed above. After 45 days the information will be submitted to Mosby for publication in the journal of *Clinical Pharmacology and Therapeutics* and to the United States Pharmacopeial Convention, Inc., for publication in the *USP Dictionary of USAN and International Nonproprietary Names*.

Sincerely yours,



Sophia V. Fuerst  
Associate Secretary  
USAN Council

SF

Enclosure: N99;57



**Pharmacia & Upjohn**

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

March 31, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

Re: NDA 20-753  
AROMASIN® Tablets (Exemestane  
Tablets)

General Correspondence  
120-Day Safety Update Delayed

Dear Sir/Madam:

On behalf of the Pharmacia & Upjohn Company I would like to inform you that the 4-month Safety Update for NDA 20-753 for exemestane tablets will be delayed. We anticipate submitting the Safety Update report in the week beginning with April 26, 1999. I should be grateful for confirmation from you that this is acceptable.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA

Telephone (616) 833-4000

ORIGINAL



Pharmacia & Upjohn

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

October 14, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence  
Response to FDA Request

ORIG AMENDMENT  
(BZ)

Dear Sir/Madam:

Please refer to your fax, dated October 8, 1999, with an information request from the Medical and Biopharmaceutical reviewer. Enclosed please find our response.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Attachments

ORIGINAL



Pharmacia & Upjohn

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA  
Telephone: (616) 833-4000

DUPLICATE  
ORIG AMENDMENT  
(BL)

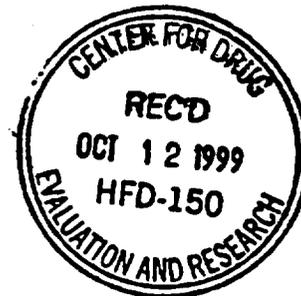
Office of:  
Cecilia S. Blomqvist  
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Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

October 11, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)



General Correspondence  
Sample Labeling

Dear Sir/Madam:

Please refer to your information request, dated October 6, 1999, for samples of labels.

Enclosed please find samples of the labels for the packaging containers;

- 1) Complimentary package containing one blister card with 15 tablets
- 2) Package containing two blister cards (30 tablets)
- 3) Child-resistant container called "Slider-Pack" containing two blister cards (30 tablets)
- 4) Bottle containing 30 tablets

Enclosed is also a sample of the copy of the blister card (15 tablets).

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Attachments



# Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
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Office of:  
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Regulatory Manager  
Regulatory Affairs

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Facsimile No. (616) 833-8237

October 7, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

DUPLICATE

NEW CORRESP  
NC



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence

Dear Sir/Madam:

Pharmacia & Upjohn request that correspondence regarding the exemestane package insert, prior to action being taken, will be done by e-mail. We understand that the e-mail link is not secured.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
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October 6, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

DUPLICATE  
NEW CORRESP  
n c



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence

Dear Sir/Madam:

Please refer to your fax to Pharmacia & Upjohn, dated October 1, 1999.

The patient data listings can be found in volume 2.19 and 2.20 of the NDA. They begin on page 8/11/73 and the information on the laboratory data endocrinology tests begins on page 8/12/137.

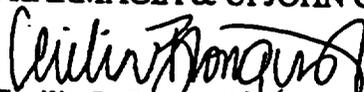
Please let me know if further clarification is needed.

This information has also been sent by fax to Ms. Ann Staten on October 1, 1999.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH

DUPLICATE



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
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Office of:  
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Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
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September 20, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

ORIG AMENDMENT

(BM)

Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)



General Correspondence  
Response to FDA Request

Dear Sir/Madam:

Please refer to your fax, dated September 10, 1999. Enclosed please find four tables which show the number of reassignments by center as for the following prognostic factors:

-any prognostic factors (i.e. the sum of the three prognostic factors shown below, if a patient falls in more than one category, it is counted only once)

- prognostic factor 1: response to prior TAM
- prognostic factor 2: prior chemotherapy
- prognostic factor 3: site of metastasis

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:mlw  
Enclosures

DUPLICATE



Pharmacia & Upjohn

7000 Portage Road  
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Regulatory Affairs

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Facsimile No. (616) 833-8237

**ORIGINAL**

ORIG AMENDMENT

(32)

September 15, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets  
(Exemestane Tablets)

General Correspondence  
Response to FDA Request

Dear Sir/Madam:

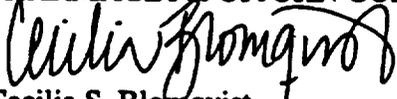
Please refer to your fax, dated September 3, 1999 regarding additional dates request/minimization procedure information.

Enclosed please find our response with attached diskette.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:mlw

Enclosures



Pharmacia & Upjohn

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DUPLICATE  
ORIG AMENDMENT  
BM

September 15, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence  
Response to FDA Request

Dear Sir/Madam:

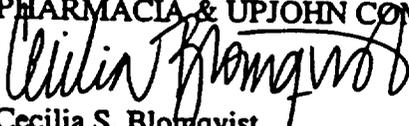
Please refer to your fax, dated September 7, 1999 to Pharmacia & Upjohn regarding a request for medical information.

Enclosed please find our response.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:crdt

Enclosures



Pharmacia & Upjohn

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September 15, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets  
(Exemestane Tablets)

DUPLICATE  
ORIG AMENDMENT  
BS

General Correspondence  
Response to FDA Request

Dear Sir/Madam:

Please refer to your fax, dated September 6, 1999 with an information request from Dr. Clare Gnecco. Enclosed please find our response.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:crdt

Enclosures



Pharmacia & Upjohn

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Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

September 14, 1999



Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

**DUPLICATE**  
ORIG AMENDMENT  
(BM)

Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets  
(Exemestane Tablets)

General Correspondence  
Responses to FDA Request

Dear Sir/Madam:

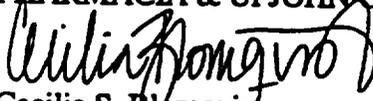
Please refer to your fax, dated September 1, 1999 concerning an information request from the Medical reviewer.

Enclosed is a copy of table 20.2 of the study report on study 94 OEXE 018.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:mlw  
Enclosures



# Pharmacia & Upjohn

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Kalamazoo, MI 49001-0199  
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Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

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September 14, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence  
Response to FDA Request

**DUPLICATE**  
**ORIG AMENDMENT**  
(35)

Dear Sir/Madam:

Please refer to your fax, dated September 10, 1999 regarding a request for SAS datasets with each patient's treatment duration and evaluability status in study 94 OEXE 018 with exemestane tablets.

Enclosed please find a diskette with the requested information.

The two datasets contain the following variables:

DUR\_TREA.SD2

PNO Protocol number  
PATNO Patient number  
WEEK\_TXT Duration of treatment (weeks)  
REAS Reason for treatment withdrawal

EVAL.SD2

PNO Protocol number  
PATNO Patient number  
EVAL Evaluable for efficacy  
REASON Primary reason for non-evaluability  
DESCRIP Description

The dataset DUR\_TREA contains 769 records, one record for each patient.

The dataset EVAL contains instead 783 records, as a small number of patients has more than one reason for non-evaluability.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:crdt

Enclosures

DUPLICATE



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

September 13, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

DUPLICATE  
ORIGINAL AMENDMENT

General Correspondence  
Responses to FDA Request

BZ

Dear Sir/Madam:

Please find below the responses to FDA Clinical Pharmacology and Biopharmaceutics Reviewer dated August 20, 1999 concerning NDA 20-753 (exemestane tablets).

**1) Status of the studies enrollment**

**1.1 Study 95-OEXE-015**

In the study report No. 9850242, dated October 1998, plasma and safety data were provided on six healthy volunteers (HV), eight subjects with moderate hepatic impairment (MHI) and three subjects with severe hepatic impairment (SHI). Urinary data were, however, provided only on a subset of subjects, i.e. two HV, three MHI and one SHI, as these were the only data available at the time of preparation of the study report. The study protocol described the accrual of nine subjects/group. To date, the accrual and the treatment have been completed for further three HV and four SHI, with two outstanding SHI remaining to be enrolled.

## 1.2 Study 95-OEXE-016

In the study report No. 9850135, dated February 1998, pharmacokinetic and safety data were provided concerning three HV, three subjects with moderate renal impairment (MRI) and four subjects with severe renal impairment (SRI). The study protocol described the accrual of six subjects/group. The accrual and the treatment of the subjects have now been completed as per protocol, with further three HV, three MRI and two SRI.

### 2) Update of the database of the study 95-OEXE015 and interim study report preparation

Urinary analyses are currently , 5 subjects with MHI and 2 subjects with SHI, for which no data were available at the time of preparation of study report no.9850242. Complete results on these subjects together with an interim report which will include the full set of plasma and urinary data on the six healthy volunteers (HV), nine subjects with moderate hepatic impairment (MHI) and three subjects with severe hepatic impairment (SHI) that had been enrolled at that time are planned to be available by the end of September 1999.

### 3) Time line of final reports of studies 95-OEXE-015 and 95-OEXE016

Plasma and urinary analyses are currently on the additional subjects who were recruited since the issuing of the preliminary reports. Based on the current program, the availability of the final report of study 95-OEXE-016 is foreseen by December 1999; that of study 95-OEXE- 015 is also foreseen by December 99, provided that the accrual of the two remaining subjects is successful over the coming weeks.

The report of study 95-OEXE-016 included in the NDA, although entitled as preliminary report, is an interim report in all respects as it includes the final data on the effect of renal impairment on the pharmacokinetics and safety of exemestane for those subjects entered into the study at the time of preparation of the report. The same will apply to the interim report of study 95-OEXE-015, which will be available by the end of September 99. In both studies, the systemic exposure of exemestane (i.e., the area under the plasma concentration-time curve) was on average 2-3 times higher in those subjects suffering from renal or hepatic insufficiency, compared with that observed in healthy volunteers. The planned number of subjects in each study was calculated assuming much smaller differences between treatment groups (30 and 50% for 95-OEXE-015 and 95-OEXE-016, respectively) than those actually observed. Thus, the number of subjects analyzed in the submitted reports has already provided sufficient statistical power to detect significant differences. As a consequence, the results presented in these two reports are considered robust enough to allow reliable conclusions on the effect of the impairment of the hepatic and renal functions on the drug pharmacokinetics.



Pharmacia & Upjohn

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Regulatory Affairs

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DUPLICATE

ORIG AMENDMENT

(BM)

September 10, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)



General Correspondence  
Responses to FDA Request

Dear Sir/Madam:

I refer to your phone call of August 30, 1999.

As requested, please find copies of the CRFs on every other patient (Patient ID's 096 001, 003, 005, 007, 009, 011, 013, 015, 017, 019, 021, 023, 025, 027, 029, 031, 033, 035, 037, 039, 041, 043, 045, 047, 049, 051, 053, in total 27 patients) and lists of all adverse events at center 096 (Prof. Bajetta, Italy) of study 94 OEXE 018 with exemestane tablets.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Enclosures



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
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Regulatory Affairs

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DUPLICATE

ORIG AMENDMENT  
(BM)

September 7, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets  
(Exemestane Tablets)

General Correspondence  
Responses to FDA Request

Dear Sir/Madam:

Please refer to your fax to Pharmacia & Upjohn, dated August 23, 1999, regarding an information request from the Medical Reviewer.

Enclosed please find CRFs for Patient ID's: 084 001 00, 086 002 00, 132 001 00 and 603 010 00 in study 94 OEXE 018.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Enclosures



Pharmacia & Upjohn

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August 30, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets (Exemestane  
Tablets)

General Correspondence  
Response to FDA Questions

DUPLICATE

NEW CORRESP

NC

Dear Sir/Madam:

Please refer to your fax to P&U, dated August 26, 1999.

We have checked the original CRF on patient #06900300 and have not found any indication of elevated bilirubin at baseline.

The bilirubin was 8.0 umol/L at registration on 6/13/97 and 3.42 umol/L at baseline (on 6/27/97).

The units reported in the listing of the normal lab value ranges are umol/L for the period considered, and the max normal lab value was 17.2 umol/L.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf/Enclosures



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

**DUPLICATE**

August 30, 1999

**ORIG AMENDMENT**  
(BS)

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



**Amendment No. 012**

**Re: NDA 20-753**  
**AROMASIN® Tablets**  
**(Exemestane Tablets)**

Dear Sir/Madam:

Please refer to the request for statistical information faxed to P&U on August 20, 1999.

Enclosed diskette has additional data from study 94 OEXE 018. It contains information already present in the SAS data set ANALYSIS.SD2 plus the following additional items:

DT\_START Treatment start date  
DT\_TP Tumor progression/censoring date  
DT\_TF Treatment failure/censoring date  
DT\_R CR/PR date  
DT\_SURV Death/censoring date

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY



Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf

Enclosures

**DEPARTMENT OF HEALTH AND HUMAN SERVICES**

**FOOD AND DRUG ADMINISTRATION**

**APPLICATION TO MARKET A NEW DRUG, BIOLOGIC, OR AN ANTIBIOTIC DRUG FOR HUMAN USE**

(Title 21, Code of Federal Regulations, 314 & 601)

Form Approved: OMB No. 0910-0338

Expiration Date: April 30, 2000

See OMB Statement on page 2.

**FOR FDA USE ONLY**

APPLICATION NUMBER

20-753

**APPLICANT INFORMATION**

NAME OF APPLICANT

Pharmacia & Upjohn Company

DATE OF SUBMISSION

August 30, 1999

TELEPHONE NO. (Include Area Code)

(616) 833-0774

FACSIMILE (FAX) Number (Include Area Code)

(616) 833-8237

APPLICANT ADDRESS (Number, Street, City, State, Country, ZIP Code or Mail Code, and U.S. License number if previously issued):

7000 Portage Road  
Kalamazoo, Michigan 49001

AUTHORIZED U.S. AGENT NAME & ADDRESS (Number, Street, City, State, ZIP Code, telephone & FAX number) IF APPLICABLE

**PRODUCT DESCRIPTION**

NEW DRUG OR ANTIBIOTIC APPLICATION NUMBER, OR BIOLOGICS LICENSE APPLICATION NUMBER (If previously issued)

ESTABLISHED NAME (e.g., Proper name, USP/USAN name)

Exemestane

PROPRIETARY NAME (trade name) IF ANY

AROMASIN®

CHEMICAL/BIOCHEMICAL/BLOOD PRODUCT NAME (if any)

CODE NAME (if any)

PNU-155971

DOSAGE FORM:

Tablets

STRENGTHS:

25 mg

ROUTE OF ADMINISTRATION:

Oral

(PROPOSED) INDICATION(S) FOR USE: Advanced breast cancer.

**APPLICATION INFORMATION**

APPLICATION TYPE

(check one)

NEW DRUG APPLICATION (21 CFR 314.50)

ABBREVIATED APPLICATION (ANDA, AADA, 21 CFR 314.94)

BIOLOGICS LICENSE APPLICATION (21 CFR part 601)

IF AN NDA, IDENTIFY THE APPROPRIATE TYPE

505 (b) (1)

505 (b) (2)

507

IF AN ANDA, OR AADA, IDENTIFY THE REFERENCE LISTED DRUG PRODUCT THAT IS THE BASIS FOR THE SUBMISSION

Name of Drug

Holder of Approved Application

TYPE OF SUBMISSION

(check one)

ORIGINAL APPLICATION

AMENDMENT TO A PENDING APPLICATION

RESUBMISSION

PRESUBMISSION

ANNUAL REPORT

ESTABLISHMENT DESCRIPTION SUPPLEMENT

SUPAC SUPPLEMENT

EFFICACY SUPPLEMENT

LABELING SUPPLEMENT

CHEMISTRY MANUFACTURING AND CONTROLS SUPPLEMENT

OTHER

REASON FOR SUBMISSION

Amendment No. 012

PROPOSED MARKETING STATUS (check one)

PRESCRIPTION PRODUCT (Rx)

OVER THE COUNTER PRODUCT (OTC)

NUMBER OF VOLUMES SUBMITTED \_\_\_\_\_

THIS APPLICATION IS

PAPER

PAPER AND ELECTRONIC

ELECTRONIC

**ESTABLISHMENT INFORMATION**

Provide locations of all manufacturing, packaging and control sites for drug substance and drug product (continuation sheets may be used if necessary). Include name, address, contact, telephone number, registration number (CFN), DMF number, and manufacturing steps and/or type of testing (e.g. Final dosage form, Stability testing) conducted at the site. Please indicate whether the site is ready for inspection or, if not, when it will be ready.

Drug Substance: Antibioticos SpA, Rodano, Italy

Drug Product: Pharmacia & Upjohn, Rodano, Italy

Cross References (list related License Applications, INDs, NDAs, PMAs, 510(k)s, IDEs, BMFs, and DMFs referenced in the current application)

ND

EF



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

July 12, 1999

NDA ORIG AMENDMENT  
(BC)

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

ORIGINAL

Amendment No. 009

Dear Sir/Madam:

As indicated in a letter from Pharmacia & Upjohn, dated June 17, 1998, we herewith submit an updated section H: Stability data on drug product, which replaces pages 159-218 of Volume 2.5 of the NDA 20-753.

In this new document, data-up to 12 months (both at 25°C and 30°C in either blister and HDPE bottles are given for batches 7001, 8001 and 8002. Furthermore, in the supportive stability section, data at 36 months (both at 25°C and 30°C) are given for batch C12F20.

A new statistical evaluation has been carried out which takes into account the new data.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf

Enclosure



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

NEW CORRESP  
NC

LMF  
08/10/99  
8-20-99



July 9, 1999

Division of Oncology Drug Products HFD150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

DUPLICATE

Re: NDA 20-753  
AROMASIN® Tablets (Exemestane  
Tablets)

General Correspondence

Dear Sir/Madam:

This letter is to inform you that exemestane obtained orphan drug designation in 1991.

Please find enclosed the official notification of orphan drug designation for exemestane (6-methylenandrosta-1,4-diene-3,17-dione), dated September 19, 1991.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf  
Enclosures

Patrick Gunn



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

July 30, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

Amendment No. 010

Re: NDA 20-753  
AROMASIN® Tablets (Exemestane  
Tablets)

Dear Sir/Madam:

Please find below the responses to FDA questions dated July 8, 1999 concerning NDA 20-753 (exemestane tablets).

Question 1: are preliminary reports. Are the studies still ongoing? If the studies are completed, the final reports should be submitted for review.

Answer 1: Studies are still ongoing and there are no final or new preliminary reports available.

Question 2: In the report for study the normalization of CLCR value to 1.73 m<sup>2</sup> is not necessary based on "Guidance for Industry Pharmacokinetics in Patients with Impaired Renal Function – Study Design, Data Analysis, and Impact on Dosing and Labeling." If the group of moderate renal impairment subjects has been enrolled, as the protocol planned, the data should be submitted.

**Answer 2:** The normalization of CLCR value to  $1.73 \text{ m}^2$  was carried out as this was set forth in the protocol. In the preliminary report, due to the limited number of entered subjects, it was considered appropriate to perform together the analyses of the moderate renal impairment subjects (which had borderline values) with the severe renal impaired subjects. The stratification at this stage would have resulted in too limited a number of moderate and severely impaired subjects, which would have been insufficient to draw any clear conclusion. The required number of moderate renal impairment subjects (6) has now entered the study, however, the relevant analyses have not been completed yet and there are therefore no new data to submit.

**Question 3:** Table 15 is missing in study report for 95-OEXE-016. Please provide the missing data.

**Answer 3:** Table 15 of study report 95-OEXE-016 is provided as Attachment 1.

**Question 4:** No assay description and validation for exemestane could be found in the study reports. Please provide detailed description and validation for the assays in the studies.

**Answer 4:** The assay description and validation for exemestane was not included in the submitted study reports as these were preliminary ones. A full description of the method and its validation were, however, included in the NDA in Volume 1.53, page 6 21 188.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY



Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Enclosures

cc: Patrick Guinn (FDA)



This application contains the following items: (Check all that apply)

1. Index
2. Labeling (check one) <input type="checkbox"/> Draft Labeling <input type="checkbox"/> Final Printed Labeling
3. Summary (21 CFR 314.50 (c))
4. Chemistry section
A. Chemistry, manufacturing, and controls information (e.g. 21 CFR 314.50 (d) (1), 21 CFR 601.2)
B. Samples (21 CFR 314.50 (e) (1), 21 CFR 601.2 (a)) (Submit only upon FDA's request)
C. Methods validation package (e.g. 21 CFR 314.50 (e) (2) (i), 21 CFR 601.2)
5. Nonclinical pharmacology and toxicology section (e.g. 21 CFR 314.50 (d) (2), 21 CFR 601.2)
6. Human pharmacokinetics and bioavailability section (e.g. 21 CFR 314.50 (d) (3), 21 CFR 601.2)
7. Clinical Microbiology (e.g. 21 CFR 314.50 (d) (4))
8. Clinical data section (e.g. 21 CFR 314.50 (d) (5), 21 CFR 601.2)
9. Safety update report (e.g. 21 CFR 314.50 (d) (5) (vi) (b), 21 CFR 601.2)
10. Statistical section (e.g. 21 CFR 314.50 (d) (6), 21 CFR 601.2)
11. Case report tabulations (e.g. 21 CFR 314.50 (f) (1), 21 CFR 601.2)
12. Case reports forms (e.g. 21 CFR 314.50 (f) (2), 21 CFR 601.2)
13. Patent information on any patent which claims the drug (21 U.S.C. 355 (b) or (c))
14. A patent certification with respect to any patent which claims the drug (21 U.S.C. 355 (b) (2) or (j) (2) (A))
15. Establishment description (21 CFR Part 600, if applicable)
16. Debarment certification (FD&C Act 306 (k)(1))
17. Field copy certification (21 CFR 314.50 (k) (3))
18. User Fee Cover Sheet (Form FDA 3397)
19. OTHER (Specify)

**CERTIFICATION**

I agree to update this application with new safety information about the drug that may reasonably affect the statement of contraindications, warnings, precautions, or adverse reactions in the draft labeling. I agree to submit safety update reports as provided for by regulation or as requested by FDA. If this application is approved, I agree to comply with all applicable laws and regulations that apply to approved applications, including, but not limited to the following:

1. Good manufacturing practice regulations in 21 CFR 210 and 211, 606, and/or 820.
2. Biological establishment standards in 21 CFR Part 600.
3. Labeling regulations in 21 CFR 201, 606, 610, 660 and/or 809.
4. In the case of a prescription drug or biological product, prescription drug advertising regulations in 21 CFR 202.
5. Regulations on making changes in application in 21 CFR 314.70, 314.71, 314.72, 314.97, 314.99, and 601.12.
6. Regulations on reports in 21 CFR 314.80, 314.81, 600.80 and 600.81.
7. Local, state and Federal environmental impact laws.

If this application applies to a drug product that FDA has proposed for scheduling under the Controlled Substances Act I agree not to market the product until the Drug Enforcement Administration makes a final scheduling decision.

The data and information in this submission have been reviewed and, to the best of my knowledge are certified to be true and accurate.

Warning: a willfully false statement is a criminal offense, U.S. Code, title 18, section 1001.

SIGNATURE OF RESPONSIBLE OFFICIAL OR AGENT 	TYPED NAME AND TITLE Cecilia S. Blomqvist, Reg Affairs Manager	DATE July 30, 1999
ADDRESS (Street, City, State, and ZIP Code) 7000 Portage Road, Kalamazoo, Michigan 49001		TELEPHONE NUMBER (616) 833-0774

Public reporting burden for this collection of information is estimated to average 40 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden to:

DHHS, Reports Clearance Officer  
Paperwork Reduction Project (0910-0338)  
Hubert H. Humphrey Building, Room 531-H  
200 Independence Avenue, S.W.  
Washington, DC 20201

An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number.

Please DO NOT RETURN this form to this address.



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

June 14, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

DUPLICATE  
ORIG AMENDMENT  
(BL)



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

Amendment No. 008

Dear Sir/Madam:

Please refer to the Fax sent from Patrick F. Guinn to Pharmacia & Upjohn on February 11, 1999.

Enclosed please find the following draft labels:

- Labeling for bottle containing 30 tablets
- Copy on blister card (15 tablets)
- Labeling for package containing one blister card (15 tablets)
- Labeling for package containing two blister cards (30 tablets)

We would appreciate your review and comments on the labels before September 1, 1999, if possible.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf  
Enclosure



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

**ORIGINAL**  
NEW CORRESP  
(NC)

June 4, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)



Amendment No. 007

Dear Sir/Madam:

We have discovered some typographical errors in Items 4 and 6 of the NDA 20-753. Enclosed you will find the corrected pages. For your convenience I have also included one version of the pages with the changes highlighted.

Corrected pages:

Item 4: Vol. 1/Page 26

Item 6: Vol. 1/ Pages 130, 132, 133, 134, 141-147, 153, 154, 159, 163, 164

Please replace the above mentioned pages.

I apologize for any inconvenience this may cause you.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:mlw  
Enclosure



Pharmacia & Upjohn

7000 Portage Road  
Kalamazoo, MI 49001-0199  
Telephone: (616) 833-4000

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

ORIGINAL  
NEW CORRESPONDENCE  
(NC)

May 24, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN® Tablets  
(Exemestane Tablets)

General Correspondence

Dear Sir/Madam:

Please refer to the information request sent from FDA to Pharmacia & Upjohn on April 29, 1999 and to the teleconference between Pharmacia & Upjohn and the Agency on May 7, 1999.

Enclosed is a CD with the requested information in SAS format together with a document that describes the data sets.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager  
CSB:lmf  
Enclosure

20 May 1999



Pharmacia & Upjohn

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

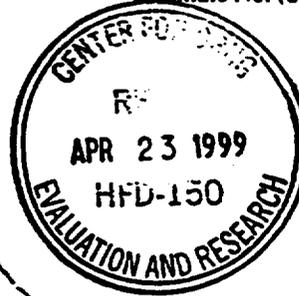
**ORIGINAL**

ORIG AMENDMENT

(BS)

April 22, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



**Amendment No. 004**

**Re: NDA 20-753**

**AROMASIN<sup>®</sup> Tablets (Exemestane Tablets)**

Dear Sir/Madam:

Please refer to the Fax from Patrick Guinn to Cecilia Blomqvist Pharmacia & Upjohn, dated March 19, 1999.

Enclosed please find one CD, dated April 16, 1999, containing SAS datasets of clinical data along with a binder of supportive documentation of the datasets.

The file contains, for each patient, the best tumor response considered in all our analyses and the calculation of the following time-dependent variables, expressed in weeks:

- time to objective response (CR, PR)
- duration of objective response (CR, PR)
- duration of overall success (CR, PR, NC  $\geq$  24 weeks) - time to progression
- time to treatment failure
- time to death (survival)

The corresponding censoring variables are provided. For study 018, the randomized treatment and the prognostic factors used in the adjusted analyses are provided as well.

Enclosed please also find two CDs, dated April 16, 1999, with the clinical data in Access format. These CDs are intended to replace the previous CDs, dated December 11, 1998 and sent to FDA with the original NDA submission on December 18, 1998 and on March 26, 1999 as an additional desk copy. These new CDs are provided since during a revision of the database, we discovered the following mistakes/omissions in the below specified tables:

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA

Telephone (616) 833-4000

**ACCESS TABLES**

**REASON FOR REPLACEMENT**

**INCLUSION\_EXCL**

This table contains the response Yes/No to the inclusion/exclusion criteria. An erroneous correspondence between the field INCLUS that contains the number of the criteria and the field DESC that contains the description of the criteria. For example, in the old version, criteria 1 could have a description that referred to criteria 2.

**LABRANGE**

This table contains all the laboratory data coming from all the sections of the CRF. In the previous version, the hematology and the chemistry laboratory data, which were requested at registration to confirm the inclusion criteria, were not included. This applies to studies 017, 018 and 022. Now these data are provided.

**SYS\_THER\_ON**

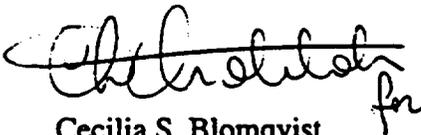
This table contains the possible anti-tumoral treatments collected in the form "Death on therapy" or "Follow-up". These data are available for studies 017/018/022 only. In the old version, no information was provided for the "Death on therapy".

All the other tables are unchanged.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY



Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf  
Attachment



Pharmacia & Upjohn

**ORIGINAL**

NEW CORRESPONDENCE  
(NC)

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
U.S. Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

February 25, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets (Exemestane Tablets)

General Correspondence  
Response to FDA Request

Dear Sir/Madam:

Please refer to the fax from Patrick Guinn to Cecilia S Blomqvist, P&U, dated February 24, 1999.

Below please find the address and the contact person where the Plasma Sample Assays were analyzed:

Italo Poggesi  
Pharmacokinetics  
Drug Metabolism Research  
Pharmacia & Upjohn  
Via Pasteur, 10  
20014 Nerviano  
Milan  
Italy

Tel Int+2-48383172  
Fax Int+2-48383012  
email: Italo.Poggesi@eu.pnu.com

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA

Telephone (616) 833-4000



Pharmacia & Upjohn

DUPLICATE

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
U.S. Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

February 25, 1999

NEW CORRESP  
(NC)

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857



Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets (Exemestane Tablets)

General Correspondence  
Response to FDA Request

Dear Sir/Madam:

Please refer to the fax from Patrick Guinn to John S. Walker, P&U, dated February 11, 1999.

Please find attached the following information:

1. CD-ROM with the following files as requested under No.3 in the above mentioned fax:

9850243b.pdf: The complete scanned Study Report 9850243 with table and figures, corresponding to Volumes 2.79 and 2.80 of the NDA

9850243a.pdf: The complete scanned Study Protocol 94 OEXE 018 corresponding to appendix 1 in Volume 2.81 of the NDA

RPT018.doc: Body text of Study Report 9850243

EXE018PR.doc: Body text of Study Protocol 94 OEXE 018 (Amendments 1&2 included)

018PRA#3.doc: Amendment 3 to Study Protocol 94 OEXE 018

2. Diskette with raw Biopharmaceutic/Pharmacokinetic Data as requested under No.6 in the above mentioned fax

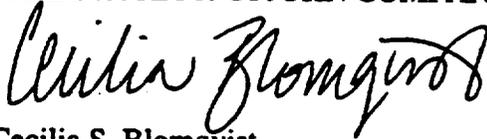
With reference to request No. 5 of the above mentioned fax, please note that no PK information is available from the phase III trial (94-OEXE-018).

The remaining requested information will be submitted as soon as we have it available.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY



Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:lmf  
Attachments

## DEPARTMENT OF HEALTH AND HUMAN SERVICES

FOOD AND DRUG ADMINISTRATION

APPLICATION TO MARKET A NEW DRUG, BIOLOGIC, OR AN  
ANTIBIOTIC DRUG FOR HUMAN USE  
(Title 21, Code of Federal Regulations, 314 & 601)

Form Approved: OMB No. 0910-0338

Expiration Date: April 30, 2000

See OMB Statement on page 2.

FOR FDA USE ONLY

APPLICATION NUMBER

20-753

## APPLICANT INFORMATION

NAME OF APPLICANT

Pharmacia &amp; Upjohn Company

DATE OF SUBMISSION

February 25, 1999

TELEPHONE NO. (Include Area Code)

(616) 833-0774

FACSIMILE (FAX) Number (Include Area Code)

(616) 833-8237

APPLICANT ADDRESS (Number, Street, City, State, Country, ZIP Code or Mail Code, and U.S. License number if previously issued):

7000 Portage Road  
Kalamazoo, Michigan 49001

AUTHORIZED U.S. AGENT NAME &amp; ADDRESS (Number, Street, City, State, ZIP Code, telephone &amp; FAX number) IF APPLICABLE

## PRODUCT DESCRIPTION

NEW DRUG OR ANTIBIOTIC APPLICATION NUMBER, OR BIOLOGICS LICENSE APPLICATION NUMBER (If previously issued)

ESTABLISHED NAME (e.g., Proper name, USP/USAN name)

Exemestane

PROPRIETARY NAME (trade name) IF ANY

AROMASIN®

CHEMICAL/BIOCHEMICAL/BLOOD PRODUCT NAME (If any)

CODE NAME (If any)

PNU-155971

DOSAGE FORM:

Tablets

STRENGTHS:

25 mg

ROUTE OF ADMINISTRATION:

Oral

(PROPOSED) INDICATION(S) FOR USE: Advanced breast cancer.

## APPLICATION INFORMATION

APPLICATION TYPE

(check one)

 NEW DRUG APPLICATION (21 CFR 314.50) ABBREVIATED APPLICATION (ANDA, AADA, 21 CFR 314.94) BIOLOGICS LICENSE APPLICATION (21 CFR part 601)

IF AN NDA, IDENTIFY THE APPROPRIATE TYPE

 505 (b) (1) 505 (b) (2) 507

IF AN ANDA, OR AADA, IDENTIFY THE REFERENCE LISTED DRUG PRODUCT THAT IS THE BASIS FOR THE SUBMISSION

Name of Drug

Holder of Approved Application

TYPE OF SUBMISSION

(check one)

 ORIGINAL APPLICATION AMENDMENT TO A PENDING APPLICATION RESUBMISSION PRESUBMISSION ANNUAL REPORT ESTABLISHMENT DESCRIPTION SUPPLEMENT SUPAC SUPPLEMENT EFFICACY SUPPLEMENT LABELING SUPPLEMENT CHEMISTRY MANUFACTURING AND CONTROLS SUPPLEMENT OTHER

REASON FOR SUBMISSION

General Correspondence

PROPOSED MARKETING STATUS (check one)

 PRESCRIPTION PRODUCT (Rx) OVER THE COUNTER PRODUCT (OTC)

NUMBER OF VOLUMES SUBMITTED

1

THIS APPLICATION IS

 PAPER PAPER AND ELECTRONIC ELECTRONIC

## ESTABLISHMENT INFORMATION

Provide locations of all manufacturing, packaging and control sites for drug substance and drug product (continuation sheets may be used if necessary). Include name, address, contact, telephone number, registration number (CFN), DMF number, and manufacturing steps and/or type of testing (e.g. Final dosage form, Stability testing) conducted at the site. Please indicate whether the site is ready for inspection or, if not, when it will be ready.

Drug Substance: Antibioticos SpA, Rodano, Italy

Drug

Product: Pharmacia &amp; Upjohn, Rodano, Italy

Cross References (list related License Applications, INDs, NDAs, PMAs, 510(k)s, IDEs, BMFs, and DMFs referenced in the current application)

ND

EF



Pharmacia & Upjohn

DUPLICATE

February 23, 1999

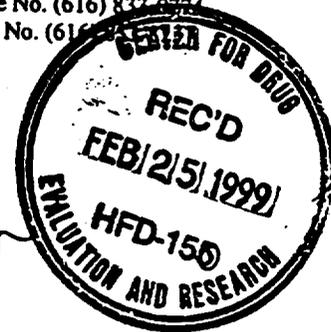
NEW CORRESPONDENCE  
(NC)

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-0774

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

*Noted  
3/3/99  
AM*



Amendment No. 002

Re: NDA 20-753  
AROMASIN® Tablets (Exemestane Tablets)

Dear Sir/Madam:

Please find enclosed revised Items 13 & 14 (Volume 2.1, Attachment 7), dated 22 February, 1999, of the above mentioned NDA. In the original Items 13 & 14 tablets were erroneously mentioned instead of the correct "exemestane" tablets. A page showing the correction is also enclosed.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Attachment



# Pharmacia & Upjohn

Office of:  
Cecilia S. Blomqvist  
Regulatory Manager  
U.S. Regulatory Affairs

Telephone No. (616) 833-0774  
Facsimile No. (616) 833-8237

February 16, 1999

Division of Oncology Drug Products HFD-150  
Center for Drug Evaluation and Research  
Food and Drug Administration  
Document Control Room  
5600 Fishers Lane  
Rockville, MD 20857

*Forwarded To  
DSI 2/19/99*

**Re: NDA 20-753  
AROMASIN<sup>®</sup> Tablets (Exemestane Tablets)**

**DESK COPIES**

Dear Sir/Madam:

Please refer to the fax from Patrick Guinn to John S. Walker, P&U, dated February 11, 1999.

Please find attached additional copies of volumes 1.46, 1.47, 1.48 and 2.9 as requested under Nos. 1. and 2. in the above-mentioned fax. Please also refer to Amendment No. 1 that has been sent to the FDA today which contains an amendment to Study Report 9850239 which is included in Volumes 1.46, 1.47 and 1.48.

The remaining requested information will be submitted as soon as we have it available.

If you have questions related to this submission, please contact me at (616) 833-0774 or address correspondence to mailstop 0635-298-113.

Sincerely,

PHARMACIA & UPJOHN COMPANY

  
Cecilia S. Blomqvist  
Regulatory Affairs Manager

CSB:SEH  
Attachment

Pharmacia & Upjohn  
7000 Portage Road  
Kalamazoo, MI 49001-0199  
USA

Telephone (616) 833-4000