CENTER FOR DRUG EVALUATION AND RESEARCH

APPLICATION NUMBER:

209935Orig1s000

PROPRIETARY NAME REVIEW(S)

PROPRIETARY NAME REVIEW

Division of Medication Error Prevention and Analysis (DMEPA)
Office of Medication Error Prevention and Risk Management (OMEPRM)
Office of Surveillance and Epidemiology (OSE)
Center for Drug Evaluation and Research (CDER)

***** This document contains proprietary information that cannot be released to the public*****

Date of This Review:	March 10, 2017
Application Type and Number:	IND 117796 and NDA 209935
Product Name and Strength:	Kisqali Femara Co-Pack (ribociclib and letrozole) Tablets, 200 mg and 2.5 mg
Product Type:	Multi-Ingredient Product
Rx or OTC:	Rx
Applicant/Sponsor Name:	Novartis
Panorama #:	2016-12078742 and 2017-12886403
DMEPA Primary Reviewer:	Tingting Gao, PharmD
DMEPA Team Leader:	Chi-Ming (Alice) Tu, PharmD
DMEPA Acting Deputy Director:	Danielle Harris, PharmD, BCPS

Contents

1 INTRODUCTION

This review evaluates the proposed proprietary name, Kisqali Femara Co-Pack, from a safety and misbranding perspective. The sources and methods used to evaluate the proposed name are outlined in the reference section and Appendix A respectively. The Applicant did not submit an external name study for this proposed proprietary name.

1.1 PRODUCT INFORMATION

The following product information is provided in the December 22, 2016 (under IND 117796) and January 30, 2017 (under NDA 209935) proprietary name submissions.

- Intended Pronunciation: kis kah' lee fe ma' ra koe' pak
- Active Ingredient: ribociclib and letrozole
- Indication of Use: treatment of postmenopausal women with hormone receptor (HR) positive, human epidermal growth factor receptor 2 (HER2)-negative advanced or metastatic breast cancer (b) (4)
- Route of Administration: Oral
- Dosage Form: Tablets
- Strength: Kisqali (ribociclib) 200mg and Femara (letrozole) 2.5mg
- Dose and Frequency:
    - Ribociclib: 600mg (three 200 mg tablets) once per day for consecutive 21 days followed by 7 days off ribociclib treatment for a 28 day cycle
    - Letrozole – 1 tablet (2.5 mg) once per day continuously for a 28-day cycle
    - Ribociclib dose reductions for 400 mg (two 200mg tablets) and 200 mg (one 200mg tablet) may be required based on individual safety and tolerability.
- How Supplied:
    - Co-packaged carton containing: three 600 mg dose Kisqali blister packs – each blister pack contains 21 tablets (3 tablets for 600 mg dose), plus one 28-tablet count bottle of FEMARA.
    - Co-packaged carton containing: three 400 mg dose Kisqali blister packs – each blister pack contains 14 tablets (2 tablets for 400 mg dose), plus one 28-tablet count bottle of FEMARA.
    - Co-packaged carton containing: one 200 mg dose Kisqali blister pack containing 21 tablets (1 tablet for 200 mg dose), plus one 28-tablet count bottle of FEMARA.
- Storage: (b) (4))
- Container and Closure Systems: Kisqali is packaged in blister pack. Femara is packaged in HDPE bottles with a safety screw cap.

2 RESULTS

The following sections provide information obtained and considered in the overall evaluation of the proposed proprietary name.

2.1 MISBRANDING ASSESSMENT

The Office of Prescription Drug Promotion (OPDP) determined that the proposed name would not misbrand the proposed product. DMEPA and the Division of Oncology Products 1 (DOP1) concurred with the findings of OPDP's assessment of the proposed name.

2.2 SAFETY ASSESSMENT

The following aspects were considered in the safety evaluation of the name.

2.2.1 United States Adopted Names (USAN) Search

There is no USAN stem present in the proprietary name[a].

2.2.2 Components of the Proposed Proprietary Name

The Applicant indicated in their submission that the proposed name, Kisqali Femara Co-Pack, is intended to state that Kisqali and Femara are co-packaged. This proprietary name is comprised of three words that contain two root names and a modifier. We evaluated the use of the root name, Femara, in section 2.2.5 and the use of the root name, Kisqali, in section 2.2.6. We also evaluated the use of both root names in combination for this proposed product and the appropriateness of the modifier in section 2.2.7.

2.2.3 FDA Name Simulation Studies

Eighty-four practitioners participated in DMEPA's prescription studies. The responses did not overlap with any currently marketed products nor did the responses sound or look similar to any currently marketed products or any products in the pipeline. Common misinterpretations of the written studies included the "Q" being interpreted as "G". Appendix B contains the results from the verbal and written prescription studies.

2.2.4 Comments from Other Review Disciplines at Initial Review

In response to the OSE, January 20, 2017 e-mail, the Division of Oncology Products 1 (DOP1) did not forward any comments or concerns relating to the proposed proprietary name at the initial phase of the review.

2.2.5 Medication Error Data Selection of Cases for the root name, "Femara"

We searched the FDA Adverse Event Reporting System (FAERS) database using the strategy listed in Table 2 (see Appendix A1 for a description of FAERS database) for name confusion errors involving Femara that would be relevant for this review.

[a] USAN stem search conducted on January 26, 2017.

Table 2. FAERS Search Strategy	
Search Date	January 27, 2017
Drug Name	Femara [product name]
Event (MedDRA Terms)	**DMEPA Official PNR Name Confusion Search Terms Event List:** Preferred Terms: CIRCUMSTANCE OR INFORMATION CAPABLE OF LEADING TO MEDICATION ERROR DRUG ADMINISTRATION ERROR) DRUG DISPENSING ERROR DRUG PRESCRIBING ERROR INTERCEPTED DRUG DISPENSING ERROR INTERCEPTED DRUG PRESCRIBING ERROR INTERCEPTED MEDICATION ERROR MEDICATION ERROR PRODUCT NAME CONFUSION TRANSCRIPTION MEDICATION ERROR Lower Level Terms: INTERCEPTED PRODUCT SELECTION ERROR INTERCEPTED WRONG DRUG PRODUCT SELECTED INTERCEPTED WRONG DRUG SELECTED PRODUCT SELECTION ERROR WRONG DEVICE DISPENSED WRONG DRUG ADMINISTERED WRONG DRUG DISPENSED WRONG DRUG PRESCRIBED WRONG DRUG PRODUCT SELECTED WRONG DRUG SELECTED WRONG PRODUCT SELECTED
Date Limits	Up to January 1, 2017

Each report was reviewed for relevancy and duplication. Duplicates were merged into a single case. The NCC MERP Taxonomy of Medication Errors was used to code the case outcome and error root causes when provided by the reporter.

The search retrieved 11 cases. After individual review, 3 reports were not included in the final analysis because they did not describe name confusion related to Femara. They were excluded for the following reasons: concomitant medication not related to name confusion (n=2), and difficulty in swallowing Femara (n=1).

Following exclusions, 8 cases were further evaluated because they described wrong drug errors involving Femara. Table 3 provides a stratification of the number of wrong drug error cases.

Table 3. Wrong drug errors associated with Femara (n=8)				
Intended	**Dispensed**	**# of cases**	**Reported Outcome**	**Reported Root Cause(s)/Contributing Factors**
Femara	Femhrt	5	Three cases reported breast soreness (n=1), breakthrough bleeding (n=1), bloating (n=1), low back pain (n=1), and menstrual spotting (n=1). One case reported that patient did not take the medication, and one case did not provide patient outcome.	Not provided (n=2), wrong selection error because Femara and Femhrt are stored side by side on pharmacy shelf (n=2), and pharmacy error (n=1).
Femara	Provera	1	The error was caught by the patient and patient did not take the wrong medicine.	A verbal prescription for "Femara 2.5 mg #90 1 tablet by mouth once daily" was heard as "Provera 2.5mg #90 1 tab by mouth once a day" due to sound-alike names.
Enablex	Femara	1	Patient experienced hair loss and weight gain, thyroid dysfunction, and fatigue. Error was discovered one month later and Femara was discontinued immediately.	Physician prescribed "Enablex (darifenacin) 15 mg once daily" but pharmacy dispensed the patient "Femara 2.5 mg once daily". Contributing factors not provided.
Tasigna	Femara	[1]	Femara was shipped to the patient but the patient did not take Femara.	The patient was applying for the Patient Assistance for Tasigna, but entered Femara as the product and Femara was subsequently shipped to the patient.

In the 5 wrong drug error cases between Femara and Femhrt, 3 cases reported the root cause as because Femara and Femhrt were stored side by side on the pharmacy shelf; root causes were not provided for the other 2 cases. In the 1 case where Femara was misinterpreted as Provera, the root cause appears to be phonetic similarity between the name pair. In the 1 case where Femara was dispensed instead of Enablex, no information was provided to attribute name confusion as the cause of the error. Lastly, in the 1 case where Femara was dispensed instead of Tasigna, the error was attributed to the patient entering Femara as the product when applying for Patient Assistance for Tasign, and no information was provided to attribute name confusion as the cause of the error.

In the evaluation of the proposed name, Kisqali Femara Co-pack, we note that the use of the root name, Kisqali, when proposed in combination with the root name Femara, helps to provide

sufficient orthographic and phonetic differences when compared with Femhrt, Provera, Enablex, and Tasigna. Therefore, we do not anticipate that the above wrong drug errors will occur with the proposed Kisqali Femara Co-Pack product.

2.2.6 Safety Analysis of the root name "Kisqali"

The root name Kisqali was submitted under NDA 209092[b] and determined to be conditionally acceptable by DMEPA in OSE Review 2016-9896919-1[c]. Since the Kisqali component of the proposed Kisqali Femara Co-pack product is identical to the proposed product and reviewed by DMEPA under NDA 209092, we maintain our decision that the proposed proprietary name Kisqali is acceptable from a safety and misbranding perspective. Thus, we find use of the root name Kisqali in the proposed proprietary name, Kisqali Femara Co-pack, acceptable for use for co-packaged product proposed under IND 117796 and NDA 209935.

2.2.7 Safety Analysis of the Combined use of the root names Kisqali and Femara and the Modifier "Co-Pack"

Novartis proposes to use both the root name Kisqali and the root name Femara in the proprietary name for this product. The proposed product Kisqali Femara Co-Pack contains the identical products as the proposed Kisqali product submitted for review under NDA 209092[b] and the already marketed Femara. Since each of the two respective active ingredients in the co-packaged product is the same as the active ingredients in the individual drug products, the proposal to use both root names in combination for this proposed co-packaged product appears acceptable in this case.

Novartis proposes to use the modifier "Co-Pack" to communicate that Kisqali and Femara are co-packaged together. They did not provide data to support that the proposed modifier is understood by healthcare practitioners and patients. However, the proposed product Kisqali Femara Co-Pack is a co-package of Kisqali and Femara just as stated in the Applicant's intended meaning for the modifier Co-Pack.

Femara is available as a single ingredient product and is marketed since 1997. Kisqali will be available as a single ingredient product pending NDA 209092 approval. Kisqali Femara Co-Pack, if approved, will represent an extension of the Kisqali product line. Given the need to distinguish the proposed co-packaged product from the product Femara alone and the pending product Kisqali alone, we considered the following:

(1) Whether a modifier could adequately distinguish the three products:

The addition of a modifier, "Co-Pack", will further differentiate Kisqali Femara Co-Pack from the currently marketed Femara tablets and the proposed Kisqali tablets. Kisqali Femara Co-Pack consists of two active ingredients whereas the currently marketed

---

[b] NDA 209092 for Kisqali is still under review by the Agency with PDUFA Goal Date of April 29, 2017.

[c] Gao T. Proprietary Name Review for Kisqali (NDA 209092). Silver Spring (MD): Food and Drug Administration, Center for Drug Evaluation and Research, Office of Surveillance and Epidemiology, Division of Medication Error Prevention and Analysis (US); 2016 Nov 21. Panorama No. 2016-9896919-1.

Femara tablets and Kisqali tablets contain only the single respective ingredients. Kisqali Femara Co-Pack, Kisqali tablets, and Femara tablets have overlapping product characteristics such as strength, dose, route of administration, and frequency of administration. Because of these similarities, it may be difficult to distinguish between the two products throughout the entire medication use process if the root name "Kisqali Femara" is used alone. For example, during procurement of the drug, ordering by the name "Kisqali Femara" alone would not provide enough information to distinguish between the Kisqali tablets and Femara tablets from the Kisqali Femara Co-Pack tablets. Therefore, we believe a modifier is necessary to help differentiate the three products given their similar and different product characteristics. Furthermore, the use of the modifier may indicate to healthcare practitioners that this product is different from the proposed Kisqali tablets and Femara tablets and prompt them to consult the full prescribing information.

We recognize there are limitations to this approach since there is postmarketing evidence that modifiers have been omitted or overlooked. [d] However, in this circumstance, since Kisqali Femara Co-Pack contains the same active ingredients with the same strength and formulation as the Kisqali tablets and Femara tablets, ordering by the name "Kisqali Femara" may prompt healthcare providers to dispense the individual Kisqali product and individual Femara product as two separate prescriptions, instead of the co-packaged product, ultimately provided the patient with the intended course of therapy. Additionally, the Dosage and Administration section of the Prescribing Information for Kisqali states that "KISQALI should be coadministered with letrozole 2.5 mg taken once daily throughout the 28-day cycle." Therefore, patients will be expected to receive two medications and may be prompted to clarify if they only received the Kisqali product without Femara. Nevertheless, the addition of a modifier "Co-Pack" to the rootname "Kisqali Femara" could add an incremental measure of safety. Thus, we believe the addition of the modifier, "Co-pack" to the root names, Kisqali Femara, is an acceptable naming convention in this case and we do not object to the use of the modifier "Co-Pack".

(2) Whether the proposed modifier is appropriate:

According to the Applicant, the modifier "Co-Pack" is meant to indicate that Kisqali and Femara are co-packaged together. We found that "Co-Pack" does not contain a medical abbreviation, does not contain a USAN stem, and does not appear to present any overt safety concerns from a look-alike or sound-alike perspective.

Therefore, for the aforementioned reasons, DMEPA does not object to the proposed proprietary name "Kisqali Femara Co-Pack".

---

[d] Lesar TS. Prescribing Errors Involving Medication Dosage Forms. *J Gen Intern Med.* 2002; 17(8): 579-587.

2.2.8 Communication of DMEPA's Analysis at Midpoint of Review

DMEPA communicated our findings to the Division of Oncology Products 1 (DOP1) via e-mail on March 7, 2017. At that time we also requested additional information or concerns that could inform our review. Per e-mail correspondence from the DOP1 on March 10, 2017, they stated no additional concerns with the proposed proprietary name, Kisqali Femara Co-Pack.

3 CONCLUSIONS

The proposed proprietary name is acceptable.

If you have any questions or need clarifications, please contact Frances Fahnbulleh, OSE project manager, at 301-796- 0942.

3.1 COMMENTS TO THE APPLICANT

We have completed our review of the proposed proprietary name, Kisqali Femara Co-Pack, and have concluded that this name is acceptable.

If any of the proposed product characteristics as stated in your January 30, 2017 submission are altered prior to approval of the marketing application, the name must be resubmitted for review.

4 REFERENCES

1. ***USAN Stems (http://www.ama-assn.org/ama/pub/physician-resources/medical-science/united-states-adopted-names-council/naming-guidelines/approved-stems.page)***

   USAN Stems List contains all the recognized USAN stems.

2. ***Phonetic and Orthographic Computer Analysis (POCA)***

POCA is a system that FDA designed. As part of the name similarity assessment, POCA is used to evaluate proposed names via a phonetic and orthographic algorithm. The proposed proprietary name is converted into its phonemic representation before it runs through the phonetic algorithm. Likewise, an orthographic algorithm exists that operates in a similar fashion. POCA is publicly accessible.

Drugs@FDA

Drugs@FDA is an FDA Web site that contains most of the drug products approved in the United States since 1939. The majority of labels, approval letters, reviews, and other information are available for drug products approved from 1998 to the present. Drugs@FDA contains official information about FDA-approved *brand name* and *generic drugs*; *therapeutic biological products*, *prescription* and *over-the-counter* human drugs; and *discontinued drugs* (see Drugs @ FDA Glossary of Terms, available at http://www.fda.gov/Drugs/InformationOnDrugs/ucm079436.htm#ther_biological).

RxNorm

RxNorm contains the names of prescription and many OTC drugs available in the United States. RxNorm includes generic and branded:

- Clinical drugs – pharmaceutical products given to (or taken by) a patient with therapeutic or diagnostic intent
- Drug packs – packs that contain multiple drugs, or drugs designed to be administered in a specified sequence

Radiopharmaceuticals, contrast media, food, dietary supplements, and medical devices, such as bandages and crutches, are all out of scope for RxNorm (http://www.nlm.nih.gov/research/umls/rxnorm/overview.html#).

Division of Medication Errors Prevention and Analysis proprietary name consultation requests

This is a list of proposed and pending names that is generated by the Division of Medication Error Prevention and Analysis from the Access database/tracking system.

3. ***Electronic Drug Registration and Listing System (eDRLS) database***

The electronic Drug Registration and Listing System (eDRLS) was established to supports the FDA's Center for Drug Evaluation and Research (CDER) goal to establish a common Structured Product Labeling (SPL) repository for all facilities that manufacture regulated drugs. The system is a reliable, up-to-date inventory of FDA-regulated, drugs and establishments that produce drugs and their associated information.

APPENDICES

Appendix A

FDA's Proprietary Name Risk Assessment evaluates proposed proprietary names for misbranding and safety concerns.

1. **Misbranding Assessment**: For prescription drug products, OPDP assesses the name for misbranding concerns. . For over-the-counter (OTC) drug products, the misbranding assessment of the proposed name is conducted by DNDP. OPDP or DNDP evaluates proposed proprietary names to determine if the name is false or misleading, such as by making misrepresentations with respect to safety or efficacy. For example, a fanciful proprietary name may misbrand a product by suggesting that it has some unique effectiveness or composition when it does not (21 CFR 201.10(c)(3)). OPDP or DNDP provides their opinion to DMEPA for consideration in the overall acceptability of the proposed proprietary name.
2. **Safety Assessment**: The safety assessment is conducted by DMEPA, and includes the following:

a. Preliminary Assessment: We consider inclusion of USAN stems or other characteristics that when incorporated into a proprietary name may cause or contribute to medication errors (i.e., dosing interval, dosage form/route of administration, medical or product name abbreviations, names that include or suggest the composition of the drug product, etc.) See prescreening checklist below in Table 2*. DMEPA defines a medication error as any preventable event that may cause or lead to inappropriate medication use or patient harm while the medication is in the control of the health care professional, patient, or consumer. [e]

[e] National Coordinating Council for Medication Error Reporting and Prevention. http://www nccmerp.org/aboutMedErrors.html. Last accessed 10/11/2007.

***Table 2- Prescreening Checklist for Proposed Proprietary Name**

	Answer the questions in the checklist below. Affirmative answers to any of these questions indicate a potential area of concern that should be carefully evaluated as described in this guidance.
Y/N	**Is the proposed name obviously similar in spelling and pronunciation to other names?**
	Proprietary names should not be similar in spelling or pronunciation to proprietary names, established names, or ingredients of other products.
Y/N	**Are there inert or inactive ingredients referenced in the proprietary name?**
	Proprietary names should not incorporate any reference to an inert or inactive ingredient in a way that might create an impression that the ingredient's value is greater than its true functional role in the formulation (21 CFR 201.10(c)(4)).
Y/N	**Does the proprietary name include combinations of active ingredients?**
	Proprietary names of fixed combination drug products should not include or suggest the name of one or more, but not all, of its active ingredients (see 21 CFR 201.6(b)).
Y/N	**Is there a United States Adopted Name (USAN) stem in the proprietary name?**
	Proprietary names should not incorporate a USAN stem in the position that USAN designates for the stem.
Y/N	**Is this proprietary name used for another product that does not share at least one common active ingredient?**
	Drug products that do not contain at least one common active ingredient should not use the same (root) proprietary name.
Y/N	**Is this a proprietary name of a discontinued product?**
	Proprietary names should not use the proprietary name of a discontinued product if that discontinued drug product does not contain the same active ingredients.

b. Phonetic and Orthographic Computer Analysis (POCA): Following the preliminary screening of the proposed proprietary name, DMEPA staff evaluates the proposed name against potentially similar names. In order to identify names with potential similarity to the proposed proprietary name, DMEPA enters the proposed proprietary name in POCA and queries the name against the following drug reference databases, Drugs@fda, CernerRxNorm, and names in the review pipeline using a 55% threshold in POCA. DMEPA reviews the combined orthographic and phonetic matches and group the names into one of the following three categories:
   - Highly similar pair: combined match percentage score ≥70%.
   - Moderately similar pair: combined match percentage score ≥55% to ≤ 69%.
   - Low similarity: combined match percentage score ≤54%.

Using the criteria outlined in the check list (Table 3-5) that corresponds to each of the three categories (highly similar pair, moderately similar pair, and low similarity), DMEPA evaluates the name pairs to determine the acceptability or non-acceptability of a proposed proprietary name. The intent of these checklists is to increase the transparency and predictability of the safety determination of whether a proposed name is vulnerable to confusion from a look-alike or sound-alike perspective. Each bullet below corresponds to the name similarity category cross-references the respective table that addresses criteria that DMEPA uses to determine whether a name presents a safety concern from a look-alike or sound-alike perspective.

- For highly similar names, differences in product characteristics often cannot mitigate the risk of a medication error, including product differences such as strength and dose. Thus, proposed proprietary names that have a combined score of ≥ 70 percent are at risk for a look-alike sound-alike confusion which is an area of concern (See Table 3).
- Moderately similar names are further evaluated to identify the presence of attributes that are known to cause name confusion.
    - Name attributes: We note that the beginning of the drug name plays a significant role in contributing to confusion. Additionally, drug name pairs that start with the same first letter and contain a shared letter string of at least 3 letters in both names are major contributing factor in the confusion of drug names[f]. We evaluate all moderately similar names retrieved from POCA to identify the above attributes. These names are further evaluated to identify overlapping or similar strengths or doses.
    - Product attributes: Moderately similar names of products that have overlapping or similar strengths or doses represent an area for concern for FDA. The dose and strength information is often located in close proximity to the drug name itself on prescriptions and medication orders, and the information can be an important factor that either increases or decreases the potential for confusion between similarly named drug pairs. The ability of other product characteristics to mitigate confusion (e.g.,

[f] Shah, M, Merchant, L, Characteristics That May Help in the Identification of Potentially Confusing Proprietary Drug Names. Therapeutic Innovation & Regulatory Science, September 2016

route, frequency, dosage form) may be limited when the strength or dose overlaps. DMEPA reviews such names further, to determine whether sufficient differences exist to prevent confusion. (See Table 4).

- Names with low similarity that have no overlap or similarity in strength and dose are generally acceptable (See Table 5) unless there are data to suggest that the name might be vulnerable to confusion (e.g., prescription simulation study suggests that the name is likely to be misinterpreted as a marketed product). In these instances, we would reassign a low similarity name to the moderate similarity category and review according to the moderately similar name pair checklist.

c. FDA Prescription Simulation Studies: DMEPA staff also conducts a prescription simulation studies using FDA health care professionals.

Three separate studies are conducted within the Centers of the FDA for the proposed proprietary name to determine the degree of confusion of the proposed proprietary name with marketed U.S. drug names (proprietary and established) due to similarity in visual appearance with handwritten prescriptions or verbal pronunciation of the drug name. The studies employ healthcare professionals (pharmacists, physicians, and nurses), and attempts to simulate the prescription ordering process. The primary Safety Evaluator uses the results to identify orthographic or phonetic vulnerability of the proposed name to be misinterpreted by healthcare practitioners.

In order to evaluate the potential for misinterpretation of the proposed proprietary name in handwriting and verbal communication of the name, inpatient medication orders and/or outpatient prescriptions are written, each consisting of a combination of marketed and unapproved drug products, including the proposed name. These orders are optically scanned and one prescription is delivered to a random sample of participating health professionals via e-mail. In addition, a verbal prescription is recorded on voice mail. The voice mail messages are then sent to a random sample of the participating health professionals for their interpretations and review. After receiving either the written or verbal prescription orders, the participants record their interpretations of the orders which are recorded electronically.

d. Comments from Other Review Disciplines: DMEPA requests the Office of New Drugs (OND) and/or Office of Generic Drugs (OGD), ONDQA or OBP for their comments or concerns with the proposed proprietary name, ask for any clinical issues that may impact the DMEPA review during the initial phase of the name review. Additionally, when applicable, at the same time DMEPA requests concurrence/non-concurrence with OPDP's decision on the name. The primary Safety Evaluator addresses any comments or concerns in the safety evaluator's assessment.

   The OND/OGD Regulatory Division is contacted a second time following our analysis of the proposed proprietary name. At this point, DMEPA conveys their decision to accept or reject the name. The OND or OGD Regulatory Division is requested to provide any further information that might inform DMEPA's final decision on the proposed name.

   Additionally, other review disciplines opinions such as ONDQA or OBP may be considered depending on the proposed proprietary name.

   When provided, DMEPA considers external proprietary name studies conducted by or for the Applicant/Sponsor and incorporates the findings of these studies into the overall risk assessment.

The DMEPA primary reviewer assigned to evaluate the proposed proprietary name is responsible for considering the collective findings, and provides an overall risk assessment of the proposed proprietary name.

Table 3. Highly Similar Name Pair Checklist (i.e., combined Orthographic and Phonetic score is ≥ 70%).

Answer the questions in the checklist below. Affirmative answers to some of these questions suggest that the pattern of orthographic or phonetic differences in the names may render the names less likely to confusion, provided that the pair does not share a common strength or dose.			
Orthographic Checklist		Phonetic Checklist	
Y/N	Do the names begin with different first letters? *Note that even when names begin with different first letters, certain letters may be confused with each other when scripted.*	**Y/N**	Do the names have different number of syllables?
Y/N	Are the lengths of the names dissimilar* when scripted? **FDA considers the length of names different if the names differ by two or more letters.*	**Y/N**	Do the names have different syllabic stresses?
Y/N	Considering variations in scripting of some letters (such as *z* and *f*), is there a different number or placement of	**Y/N**	Do the syllables have different phonologic processes, such vowel reduction, assimilation,

	upstroke/downstroke letters present in the names?		or deletion?
Y/N	Is there different number or placement of cross-stroke or dotted letters present in the names?	Y/N	Across a range of dialects, are the names consistently pronounced differently?
Y/N	Do the infixes of the name appear dissimilar when scripted?		
Y/N	Do the suffixes of the names appear dissimilar when scripted?		

Table 4: Moderately Similar Name Pair Checklist (i.e., combined score is ≥55% to ≤69%).

Step 1	Review the DOSAGE AND ADMINISTRATION and HOW SUPPLIED/STORAGE AND HANDLING sections of the prescribing information (or for OTC drugs refer to the Drug Facts label) to determine if strengths and doses of the name pair overlap or are very similar. Different strengths and doses for products whose names are moderately similar may decrease the risk of confusion between the moderately similar name pairs. Name pairs that have overlapping or similar strengths or doses have a higher potential for confusion and should be evaluated further (see Step 2). Because the strength or dose could be used to express an order or prescription for a particular drug product, overlap in one or both of these components would be reason for further evaluation. For single strength products, also consider circumstances where the strength may not be expressed. For any i.e. drug products comprised of more than one active ingredient, consider whether the strength or dose may be expressed using only one of the components. To determine whether the strengths or doses are similar to your proposed product, consider the following list of factors that may increase confusion: • Alternative expressions of dose: 5 mL may be listed in the prescribing information, but the dose may be expressed in metric weight (e.g., 500 mg) or in non-metric units (e.g., 1 tsp, 1 tablet/capsule). Similarly, a strength or dose of 1000 mg may be expressed, in practice, as 1 g, or vice versa. • Trailing or deleting zeros: 10 mg is similar in appearance to 100 mg

<table>
<tr><td></td><td colspan="2">which may potentiate confusion between a name pair with moderate similarity.

• Similar sounding doses: 15 mg is similar in sound to 50 mg</td></tr>
<tr><td>Step 2</td><td colspan="2">Answer the questions in the checklist below. Affirmative answers to some of these questions suggest that the pattern of orthographic or phonetic differences in the names may reduce the likelihood of confusion for moderately similar names <u>with</u> overlapping or similar strengths or doses.</td></tr>
<tr><td></td><td>Orthographic Checklist (Y/N to each question)
• Do the names begin with different first letters?
Note that even when names begin with different first letters, certain letters may be confused with each other when scripted.
• Are the lengths of the names dissimilar* when scripted?
*FDA considers the length of names different if the names differ by two or more letters.
• Considering variations in scripting of some letters (such as z and f), is there a different number or placement of upstroke/downstroke letters present in the names?
• Is there different number or placement of cross-stroke or dotted letters present in the names?
• Do the infixes of the name appear dissimilar when scripted?
• Do the suffixes of the names appear dissimilar when scripted?</td><td>Phonetic Checklist (Y/N to each question)
• Do the names have different number of syllables?
• Do the names have different syllabic stresses?
• Do the syllables have different phonologic processes, such vowel reduction, assimilation, or deletion?
• Across a range of dialects, are the names consistently pronounced differently?</td></tr>
</table>

Table 5: Low Similarity Name Pair Checklist (i.e., combined score is ≤54%).

Names with low similarity are generally acceptable unless there are data to suggest that the name might be vulnerable to confusion (e.g., prescription simulation study suggests that the name is likely to be misinterpreted as a marketed product). In these instances, we would reassign a low similarity name to the moderate similarity category and review according to the moderately similar name pair checklist.

Appendix A1: Description of FAERS

The FDA Adverse Event Reporting System (FAERS) is a database that contains information on adverse event and medication error reports submitted to FDA. The database is designed to support the FDA's postmarket safety surveillance program for drug and therapeutic biologic products. The informatic structure of the FAERS database adheres to the international safety reporting guidance issued by the International Conference on Harmonisation. FDA's Office of Surveillance and Epidemiology codes adverse events and medication errors to terms in the Medical Dictionary for Regulatory Activities (MedDRA) terminology. Product names are coded using the FAERS Product Dictionary. More information about FAERS can be found at: http://www.fda.gov/Drugs/GuidanceComplianceRegulatoryInformation/Surveillance/AdverseDrugEffects/default.htm.

Appendix B: Prescription Simulation Samples and Results

Figure 1. Kisqali Femara Co-Pack Study (Conducted on January 24, 2017)

Handwritten Medication Order/Prescription	Verbal Prescription
Medication Order: Kisqali Femara Copack 600 mg and 2.5 mg po once daily Outpatient Prescription: Kisqali Femara Co-Pack 400 mg use as directed #1 carton	Kisqali Femara Co-Pack 400 mg Use as directed Dispense one carton

FDA Prescription Simulation Responses (Aggregate 1 Rx Studies Report)

Study Name: Kisqali Femara Co Pack

As of Date 2/21/2017

297 People Received Study

84 People Responded

Total	**31**	**19**	**34**	
INTERPRETATION	**OUTPATIENT**	**VOICE**	**INPATIENT**	**TOTAL**
KASCALEY FEMALA COLD PACK	0	1	0	1
KASCALI FAMALA	0	1	0	1
KASKALI FORMALA COPACK	0	1	0	1
KESKALI FAMALA COLPAC	0	1	0	1
KESTALLY	0	1	0	1
KIRQALI FEMALA CO-PACK	2	0	0	2
KIRQALI FEMARA CO PACK	1	0	0	1
KIRQALI FEMARA CO-PACK	1	0	0	1
KIRQULI FEMALA CO-PACK	1	0	0	1
KISCALLIEFAMARA	0	1	0	1
KISCALLIFOMALLA COPACK	0	1	0	1
KISCOLLIE ? COPACK	0	1	0	1

KISCOLY FAMAWA COPAX?	0	1	0	1
KISCOOLI FIMALA CO PACK	0	1	0	1
KISGALI FELALA CO-PACK	1	0	0	1
KISGALI FEMARA CO-PACK	5	0	0	5
KISGALI FEMARA C-PACK	1	0	0	1
KISGANTRI FEMARA	1	0	0	1
KISKALI ?EMARA COPACK	0	0	1	1
KISKALI COPACK	0	1	0	1
KISKALLI FUMERA COPAK	0	1	0	1
KISKALLIFOMARA COLD PACK	0	1	0	1
KISKALY FEMARA COPACK	0	1	0	1
KISQALI FEMALA CO-PACK	2	0	0	2
KISQALI FEMALA CO-PAK	1	0	0	1
KISQALI FEMARA	0	0	1	1
KISQALI FEMARA CO-	1	0	0	1
KISQALI FEMARA CO PACK	1	0	1	2
KISQALI FEMARA CO-PAC	1	0	0	1
KISQALI FEMARA COPACK	0	0	15	15
KISQALI FEMARA CO-PACK	9	0	6	15
KISQALI FEMARA COPAK	0	0	2	2
KISQALI FEMORA	0	0	1	1
KISQALI FEMORA COPACK	0	0	1	1
KISQALI FEMORA CO-PACK	0	0	1	1
KISQALI FENAIA CO-PACK	1	0	0	1
KISQALI GEMARA COPACK	0	0	1	1
KISQALI ZEMARA COPACK	0	0	1	1
KISQUALI FEMARA COPACK	0	0	2	2
KISQUALI FEMARA CO-PACK	0	0	1	1
KUGALI FEMALA CO-POCH	1	0	0	1
KUSGALI FEMARA CO-PACK	1	0	0	1
QUISCILLA COLD PACK	0	1	0	1
TESTALE SOMRARA COPACK	0	1	0	1
TISCALI FEMARA COLD PACK	0	1	0	1
TISCALLI FORMALLI COPACK	0	1	0	1
TYSCALI FORMARA COPACK	0	1	0	1

This is a representation of an electronic record that was signed electronically and this page is the manifestation of the electronic signature.

/s/

TINGTING N GAO
03/10/2017

CHI-MING TU
03/10/2017

DANIELLE M HARRIS
03/10/2017