



**PATENT OWNER**  
**UNITED THERAPEUTICS CORPORATION**

IPR2016-00006  
*U.S. Patent No. 8,497,393*  
November 29, 2016

LIT Ex 2061

# Petitioner Bears the Burden of Proving Invalidity

- “In an inter partes review, the burden of persuasion is on the petitioner to prove ‘unpatentability by a preponderance of the evidence,’ 35 U.S.C. § 316(e), and that burden never shifts to the patentee.”
  - *In re Magnum Oil Tools International, Inc.* (Fed. Cir. 2016), citing *Dynamic Drinkware*, 800 F.3d at 1377.
- “[T]he petitioner continues to bear the burden of proving unpatentability after institution, and must do so by a preponderance of the evidence at trial.”
  - *In re Magnum Oil Tools International, Inc.* (Fed. Cir. 2016).
- “[T]he Board has an obligation to assess the question anew and based on the totality of the record.”

## Prior Art at Issue

---

- The only prior art treprostinil examples in this IPR are (a) the single example in Moriarty 2004 of treprostinil acid (Ex. 1001, pp. 13) and (b) the single example in Phares WO 2005/007081 of the diethanolamine salt of treprostinil, form B (Ex. 1005, pp. 8).
- Kawakami and Ege do not disclose treprostinil or any prostaglandin derivative and do not disclose how to purify such compounds specifically.
- To the extent Petitioner's evidence shifts burden of production, Patent Owner need only present sufficient evidence to rebut evidence relied upon by Petitioner.

## Claim Construction in an IPR Analysis

- “While it is true that, as a general rule, the words of a patent claim be given their plain, ordinary and accustomed meaning to one of ordinary skill in the relevant art, *Toro Co. v. White Consol. Indus., Inc.*, 199 F.3d 1295, 1299 (Fed. Cir. 1999), a court must nevertheless examine the remaining intrinsic evidence to determine whether the patentee has set forth an explicit definition of a term contrary to its ordinary meaning, disclaimed subject matter, or has otherwise limited the scope of the claims.”
  - *Day Intern., Inc. v. Reeves Brothers, Inc.*, 260 F.3d 1343, 1349 (Fed. Cir. 2001) (emphasis added) (PO Resp.)
- The Federal Circuit in *SafeTCare Mfg* incorporated limitations into claim construction where the specification repeatedly indicated that the invention operated by “pushing (as opposed to pulling) forces,” and characterized the “pushing forces” as “an important feature of the present invention.”
  - *SafeTCare Mfg., Inc. v. Tele-Made, Inc.*, 497 F.3d 1262, 1269-70 (Fed. Cir. 2007)(PO Resp.)

# Proper Claim Construction Requires Consideration of Impurities Present In The Product

## Example 6

Comparison of the Former Process and a Working Example of the Process According to the Present Invention

-continued

Step No. Step

Step No.	Steps	Former Process (Batch size: 500 g)	Working example of the Process according to the present invention (Batch size: 5 kg)
38	Brine wash	N/A	
39	Sodium sulfate	N/A	
40	Filter	N/A	
41	Evaporation	N/A	
42	Crude drying on tray	1 or 3 days	
43	Ethanol & water for cryst.	5.1 L + 5.1 L	
44	Crystallization in	20-L rotavap f	
45	Temperature of crystallization	2 h r.t., fridge-	
46	Filtration	Buchner funnel	Auron
47	Washing	20% (10 L) cooled ethanol-water	20% ethan
48	Drying before oven	Buchner funnel (20 h) Tray (no)	Auron Tray (
49	Oven drying	15 hours, 55° C.	6-15 h
50	Vacuum	<-0.095 mPA	<5 Torr
51	UT-15 yield weight	~535 g	~1,100
52	% yield from triol)	~91%	~89%
53	Purity	~99.0%	99.9%

Example 6 in the '393 Patent specifically indicates the purity of a working example of the invention is 99.9% whereas purity of the former Moriarty product was ~99.0%

- Ex. 1001, 17:step 53. (PO R

# Explore Litigation Insights

Docket Alarm provides insights to develop a more informed litigation strategy and the peace of mind of knowing you're on top of things.

## Real-Time Litigation Alerts



Keep your litigation team up-to-date with **real-time alerts** and advanced team management tools built for the enterprise, all while greatly reducing PACER spend.

Our comprehensive service means we can handle Federal, State, and Administrative courts across the country.

## Advanced Docket Research



With over 230 million records, Docket Alarm's cloud-native docket research platform finds what other services can't. Coverage includes Federal, State, plus PTAB, TTAB, ITC and NLRB decisions, all in one place.

Identify arguments that have been successful in the past with full text, pinpoint searching. Link to case law cited within any court document via Fastcase.

## Analytics At Your Fingertips



Learn what happened the last time a particular judge, opposing counsel or company faced cases similar to yours.

Advanced out-of-the-box PTAB and TTAB analytics are always at your fingertips.

## API

Docket Alarm offers a powerful API (application programming interface) to developers that want to integrate case filings into their apps.

## LAW FIRMS

Build custom dashboards for your attorneys and clients with live data direct from the court.

Automate many repetitive legal tasks like conflict checks, document management, and marketing.

## FINANCIAL INSTITUTIONS

Litigation and bankruptcy checks for companies and debtors.

## E-DISCOVERY AND LEGAL VENDORS

Sync your system to PACER to automate legal marketing.