

Bleep – DreamPort the CPAP Solution Providers Can Depend on for Improved Patient Outcomes

An Uphill Climb

Introducing a patient to CPAP therapy has its rewards and its challenges. It is truly gratifying when a patient wakes from sleep with relief after the [initial titration](#) has given them the long-missed restful sleep they crave.

You are deeply aware of both the benefits of compliance to therapy and the risks of noncompliance. You do your best to convey these risks to your patients and urge them to give the therapy a chance. You work with patients to achieve the use threshold of at least 4 hours of at least 70 percent of nights, knowing it both as requisite for insurance coverage and a good baseline for seeing a reduction in the symptoms and an improved quality of life.

And you also know that estimates of OSA patient noncompliance to effective CPAP therapy range [from 20-odd to 80-odd percent \(Chiner, Andreu, Sancho-Chust, Sánchez-de-la-Torre, & Barbé, 2013\)](#). You may have read the five-year follow up that points out that nonadherence is typically undercounted, because it excludes prescribed patients who look at the options, are intimidated and [simply refuse to begin therapy \(Wolkove et al., 2008\)](#).

You may have also seen, as the research suggests, that the more time you can spend with patients explaining CPAP's benefits and ensuring its adoption goes smoothly, the likelier your patients are to stick to and derive benefit from therapy. And you know better than anyone about the intense time pressures that may keep you in lockstep with your scheduled caseload, so that this patient or



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that just doesn't get that extra five or ten minutes that might get them off to a better start.

And inevitably you are familiar with patients' initial reactions: the shudder, the flinch, the sigh, and the "I have to wear *that*? Every *night*? I'll look like Darth Vader!"

Intimidating First Impression

Initial impressions of CPAP mask options will influence successful adoption among those who are willing to give CPAP therapy a try. A review of adherence patterns cites multiple studies indicating the decision to embrace or reject CPAP is most often made [during the first week of therapy](#), and predicts long-term adherence [\(Weaver & Grunstein, 2008\)](#).

In fact, a National Institute of Health (NIH) study [\(Wolkove et al., 2008\)](#) outlined some critical mask issues that contributed to noncompliance. Those issues are:

- Mask discomfort
- Claustrophobia
- Frequent awakening
- Nasal discomfort

Especially during initial titration, the less enclosing/constraining the therapy mode presented, the likelier such patients may be to comply.

What Patients Really Think About CPAP Masks

Bleep recently conducted a survey of CPAP users that was designed to identify the leading areas of dissatisfaction with CPAP masks. The survey revealed that less than half of current users are highly satisfied with their current CPAP mask. Perhaps more tellingly, only 44% would recommend their current mask, even to friends suffering from sleep apnea. Applying the net promoter score, a common measure of customer loyalty, the results yielded NPS scores for CPAP masks (19.1%) about on a par with that of media companies, and below that for the public sector and the phone carriers, and far below that of healthcare in general. Sleep apnea patients are dissatisfied with current CPAP mask solutions.



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The Biggest Annoyance

The leading issues with CPAP masks in our research were broken seals and frequent awakenings during the night, with less than 4 out of 10 users indicating they were very or extremely satisfied with mask performance in these areas. They further expressed dissatisfaction with air being blown into their eyes or elsewhere, having their sleeping position or motion restricted in order to avoid leakage, and needing to reposition the mask and/or tighten straps during the night, further awakening them and disturbing sleep.

That Really Chaps My Face

Over 40% of the respondents were dissatisfied with skin irritations and chapping that traditional masks cause. In addition, 36% of the overall sample population did not like the lines that the mask left on their face in the morning and this number jumps to 53% when looking just at female respondents. Respondents also identified the force required to ensure a tight seal as a particular source of discomfort (36% were dissatisfied).

Harmful Bacteria

Over and above the discomfort and inconvenience of particular masks and pillows, there is an additional risk that concerns CPAP users – bacteria build up. They realize that with the moisture from the CPAP humidification and their breath, the mask and tube can be a breeding ground for harmful bacteria.

Of course patients are taught that there is a cleaning protocol to ensure health safety. Just how well do patients adhere to it? The ones in our survey admit: not that well. A little over half (55%) claim to clean their masks “as often as I should”, while the other 45% are either ambivalent (26%) or feel they do *not* clean it enough (19%). A roughly similar distribution appears on the question of mask replacement “as often as I should”: 46% agree, 16% disagree, 38% ambivalent. When it comes to cleaning the connection hose, responses fell into near-quartiles ranging from “more than once a month” (27%) through “about once a month” (27%) and “every few months” (21%) to “once or twice a year or less” (25%).



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Introducing the Bleep – DreamPort Sleep Solution

A more ideal scenario would be to present a CPAP interface to the patient that was not a traditional mask at all. Its smaller size and reduced weight would deal specifically with any issues related to claustrophobia and mask discomfort. In addition, the design of how the mask is applied to the face would be much more secure than today's mask, enabling patients to sleep through the night more soundly without frequent awakenings.

That is precisely the design of the Bleep - DreamPort Sleep Solution. We like to call it a “maskless solution” because there is no cumbersome headgear, no straps and it is half the weight and size of nasal pillow masks. The interface is held on the patient's face with gentle, hypoallergenic tape that seals the DreamPorts securely at the base of the nostril. That means nothing enters the nostril except the stream of air from the machine. And most importantly, the gentle adhesive strips ensure a much stronger seal than other masks on the market today. The DreamPort Sleep Solution's swivel connector easily attaches to any CPAP machine.



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Less is More

As recently discussed in a [roundtable of sleep clinic and research experts \(Sleep Review, 2015\)](#), the trend toward smaller and more discreet interfaces better serves younger users, people who travel and people who desire a more active lifestyle. For all such patients, we would hope to help jump-start adoption by a first impression that suggests—and real-life use that delivers—compactness, sleek design, portability, and ease of use. And, of course, for all current users who valiantly maintain their therapy despite their dissatisfactions, we want to offer another option to make it easier to persevere and reap the benefits of CPAP therapy.

Our guiding design principle is that increased comfort and ease—along with elimination of some of the drawbacks of masks and headgear—will drive greater adherence and therefore healthier benefits to the CPAP community. For the increasing number of outcome driven patients, this can improve their data and help them achieve individual health goals, as well as meet the ever growing demands based on insurance compliance and reimbursement.

The Takeaway

Bleep - DreamPort is committed to providing a solution for you and your patients that:

- Removes headgear
- Eliminates claustrophobia
- Banishes vanity lines on the face
- Stops skin soreness and damage
- Reduces leaks
- Weighs half (or less) as much as traditional masks
- Fits—without fitting—all sizes and shapes of heads and faces
- Reduces both maintenance and infections
- Delivers significant added value

We believe our patented lightweight, unobtrusive, adhesive-based design will become a new gold standard. Nothing could please us more than helping to usher in a new golden age of patient adherence and satisfaction—and maybe helping to make your professional life a little easier and more rewarding.

Isn't it time that CPAP lives up to the promise of better sleep? That it fulfills all the benefits you expect for your patient. We think so. And you will to with the help of Bleep - DreamPort. The sleep your patient deserves. The sleep solution they need.



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About the Company

Bleep is a company that has been deeply connected to the sleep apnea community. Our founder and CEO is Stuart Heatherington, an RPSGT and inventor who has suffered from sleep apnea and used CPAP therapy since 1998. Stuart knows firsthand both the benefits of CPAP and the problems and concerns that lead many users to refuse or abandon therapy. Those experiences drove the development of a new approach to ensuring adequate air supply and uninterrupted breathing during sleep without the conventional masks, straps, and other encumbrances that can compromise a great night of rest. Our mission is to deliver the world's smallest, lightest and most comfortable CPAP solution.

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Additional Resources

More about Net Promoter Score and its importance can be found on Wikipedia

https://en.wikipedia.org/wiki/Net_Promoter

A useful Blog to read about Net Promoter Score can be found at

<http://blog.clientheartbeat.com/net-promoter-score/>

Another useful link about the significance of Net Promoter Score on business can be read at

<https://www.netpromoter.com>



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Bleep for a Good Night's Sleep:

How an Innovative CPAP "Maskless" Solution will Transform Therapy

The most effective CPAP masks are the ones worn comfortably by sleep apnea patients. However, finding the right CPAP mask is easier said than done. Many of us have been there before; it's a much bigger issue than you might realize. Did you know that up to 20 million (yes million) people have sleep apnea in the United States? Pretty amazing isn't it? And that number is growing by over 7% a year in the USA and 16% worldwide. Yet, nearly 50% of them fail out on therapy and CPAP masks contribute significantly to that. That means a lot of patients are unsatisfied. According to our research, nearly 80% of CPAP users would not even recommend their own mask.

That was something that our founder, Stuart Heatherington, a 20 year Sleep Technician (RPSGT) and 18 year CPAP user learned first-hand from his own therapy and observing actual patients struggle not only in the lab setting, but at home, too. The failure rates were as large as the list of complaints. That's why he created the Bleep –DreamPort Sleep Solution.

If you suffer from obstructive sleep apnea chances are you have tried continuous positive airway pressure (CPAP) machines and masks; or at least your doctor has recommended it to you.

Doctors recommend CPAP as a treatment for sleep apnea more often than other treatments because, if done properly, it is highly effective, and it does not involve the risks and discomforts



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associated with surgeries¹. Long considered the gold standard for therapy, CPAP has the potential to improve sleep, energy², and mood³. However, as you likely know if you've tried CPAP, there are a number of problems with existing masks that make CPAP uncomfortable and therefore ineffective for some patients. If you've struggled with CPAP, you're not alone. Up to half of the patients who are supposed to use CPAP do not wear their masks enough to achieve the desired benefits⁴.

There are a number of reasons you may find your CPAP mask wearing experience less than satisfactory according to a National Institute of Health (NIH) study. That study identified these common problems with wearing CPAP masks⁵:

- Frequent awakenings during the night due to mask leaks
- Claustrophobia
- Nasal discomfort
- General mask discomfort

In an effort to overcome challenges associated with your CPAP treatment, you may have tried out multiple sizes of nasal or nasal pillow masks, putting gel pads between the mask and your skin or just wearing it for part of the night. However, regardless of which specific approach you've taken, it is likely that you have not had a particularly positive experience and are still searching for a better CPAP mask therapy. The team at Bleep has worked



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¹ Victor, 2004; Wolkove, Baltzan, Kamel, Dabrusin, & Palayew, 2008

² Wolkove et al., 2008

³ Redline et al., 1998

⁴ Victor, 2004

⁵ Canadian Journal Volume 15(7); 2008 Oct PMC2679572

tirelessly to create an innovative CPAP “maskless” solution that can deliver effective CPAP therapy without the discomfort and usage issues.

...so Bleep created the DreamPort Sleep Solution that ensures a restful and comfortable night’s sleep.

The Bleep CPAP team did extensive customer research to determine how to design a CPAP mask that better satisfied patients’ needs. The research with existing CPAP mask wearers validated the NIH study and took it further – clearly revealing the top issues, among 34 specific mask needs, which cause user dissatisfaction with CPAP masks. The Bleep team used the results to totally reconceive the customer experience, eliminating traditional headgear and other pain-inducing apparatus such as oral holders or nasal bridge devices. The resulting Bleep - DreamPort Sleep Solution is a one-size-fits-all alternative “maskless” option with the following features:

- *Performance Meets Comfort* – The Bleep –DreamPort Sleep Solution is lightweight and formed to fit you. It uses a soft, pliable, hypoallergenic tape that keeps two small nasal ports attached to your nose to help you breathe at night. There is no headgear, and no hard materials touch any part of the face. This design eliminates facial soreness or those ugly headgear lines in the morning.
- *Uninterrupted Sleep* – Unlike other CPAP masks on the market, the Bleep - DreamPort is held securely in place and does not slip on your face or leak when you move around in bed. That’s because the tape is as strong as it is



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gentle on the face. No one wants to be awakened by the dreaded hiss of a mask leak. Rest assured, you won't have to with Bleep. And, in the morning, the Bleep – DreamPorts can be removed quickly and painlessly – with no visible signs on your face.

- *Convenience* – Bleep - DreamPort helps avoid the trial-and-error period associated with identifying other mask options through frequent trips to the doctor or supplier. DreamPort truly is one size fits all. And with Bleep - DreamPort, there is no need to figure out when to replace your mask because each night you use two new, disposable breathing ports in conjunction with your DreamPort Sleep Solution – clean and bacteria free.
- *Environmental Protection* – Bleep is a company concerned about the environment. The small nasal ports are recyclable. Just peel back the tape and throw the tubes in the recycle bin. As we like to say, our masks are both clean AND green.

Given all the ways that Bleep – DreamPort Sleep Solution transforms the total patient experience, including sleep comfort, mask fit and eliminating air leaks, Bleep will undoubtedly change lives as people get the restful sleep they've been missing. Deeper and better sleep means higher energy levels, improved memory function⁶, reduced heart disease and stroke risk⁷ along with many other important health outcomes.

⁶ National Center for Biotechnology:
<http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2645251/>

⁷ American Academy of Sleep Medicine: www.sleepeducation.org/essentials-in-sleep/cpap/benefits



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Additional Resources and Reading

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