

# Portable Oxygen Concentrator Internet Survey Results

August, 2008

Portable oxygen concentrators (POCs) are becoming increasingly popular with long term oxygen therapy (LTOT) patients as an alternative to tradition portable oxygen systems. These lightweight, battery capable systems provide independence from refill sources and open up new possibilities for increased travel. Traditionally, POCs have been available from home care providers, yet many internet sites are offering POCs for sale or for rental. There have been very few significant clinical studies on the capabilities of these devices when used by a patient during exercise, travel or sleep. Nonetheless, patients have embraced the products and are using them on a daily basis.

This study was conducted to determine how patients have acquired and use POCs. This survey was only for informational purposes as it was not designed to be a scientific study. The survey was available on [www.ltotnet.org](http://www.ltotnet.org) from March 2008 to August 2008. In that time, two new POCs have been introduced to the market and were not included in the survey results.

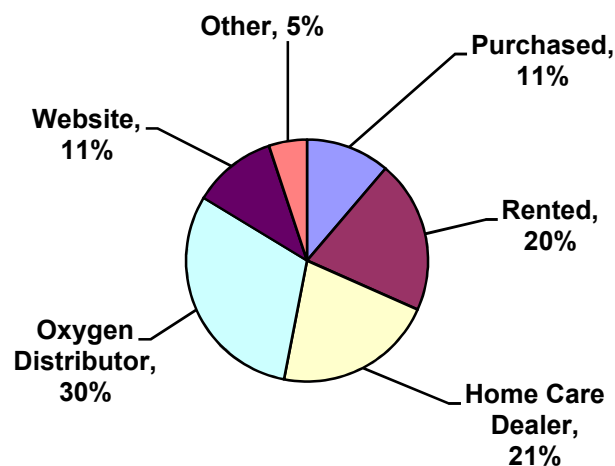
Questionnaire response:

## 1. *Have you used a POC?*

Of 173 respondents received, all have used a portable oxygen concentrator.

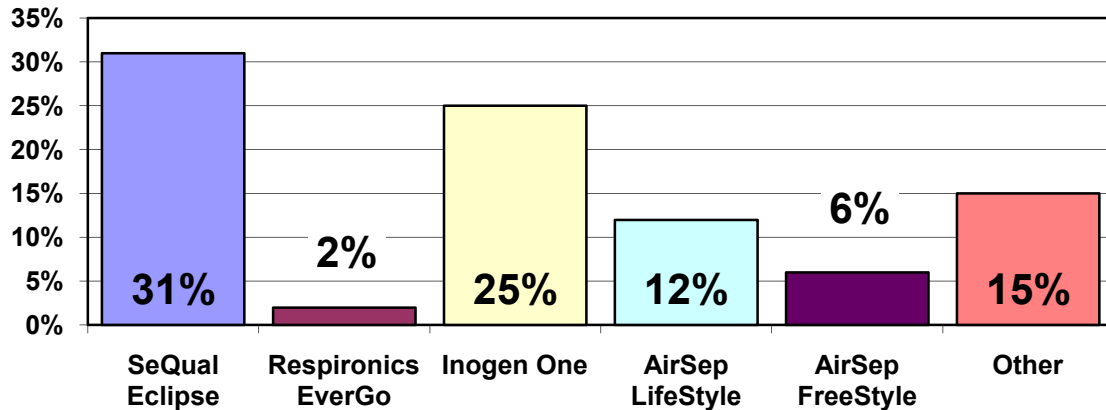
## 2. *How did you acquire your POC?*

The intent of this question was to determine how many patients obtained their POC from a source other than a home care company. There was redundancy in the responses as the Distributor, Home Care dealer and renter may have had the same meaning to some patients. Interestingly 11% of the respondents purchased from a website where there is typically little follow up or service. Purchased units also have little follow up or service as the patient assumes the responsibilities of the equipment.



### 3. What system did/ do you use?

Units listed were the currently available POCs at the start of the period that this survey was conducted. The other 15% are assumed to be patients that thought their small (31 lb) stationary concentrators were considered portable, patients that may have acquired a new POC model during the survey period, or did not understand the question.



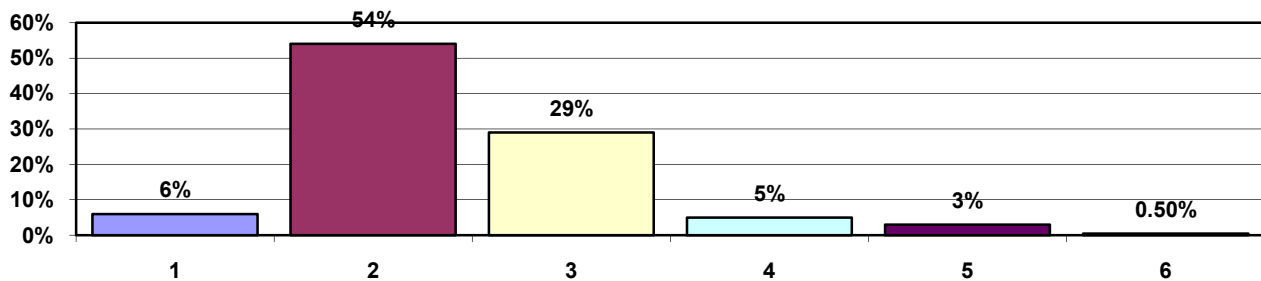
### 4. Have you ever changed to another system?

43 (25%) Yes.  
127 (74%) No.  
3 respondents did not answer.

### 5. What was your resting oxygen setting when using the POC?

POCs that are titrated on the patient are typically done while the patient is at rest. On POCs with a maximum dose setting of 5 or 6, a resting setting above 3 would not provide the patient much range of available dose settings when they exercised. Only 8.5% of the patients that responded were above 3.

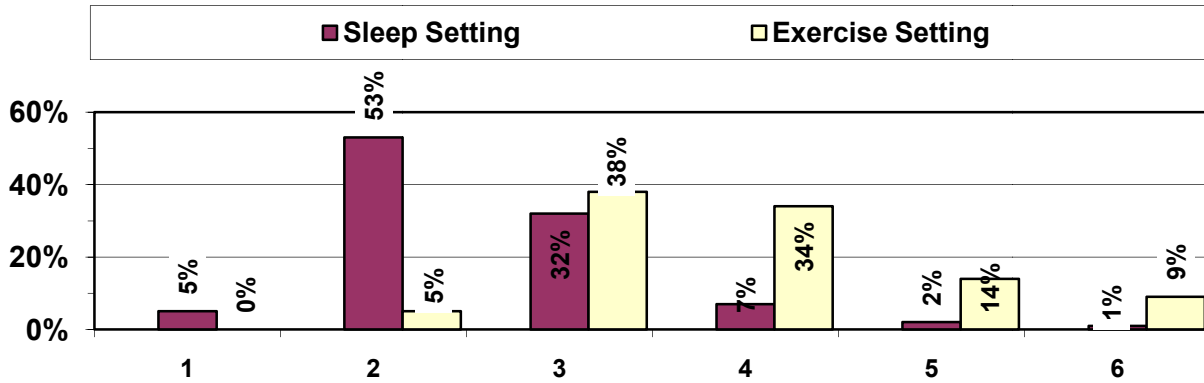
What was your resting oxygen setting?



**6. Did you use a different setting for sleep or exercise?**

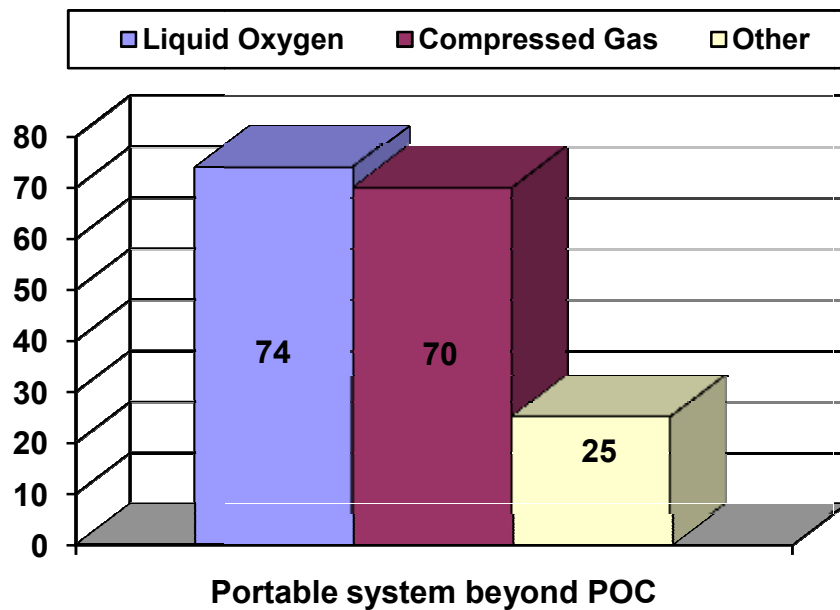
71 patients (41% of the total respondents) indicated they did NOT use a different setting for sleep or exercise while using a POC.

Of the remaining 102 patients (59% of the total respondents) who indicated setting changes, 90% indicated changing the device setting to 1, 2 or 3 during sleep; 95% indicated changing the device setting to 3, 4, 5 or 6 during exercise.



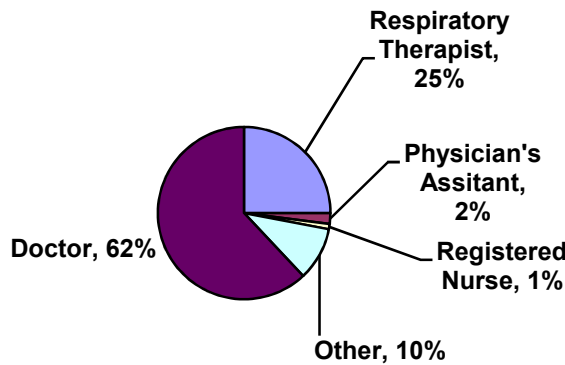
**7. What portable system do you use when not using a POC?**

74 of the 173 respondents (44%) reported that they use a liquid oxygen system (LOX) for their portable oxygen needs. CMS data has indicated that less than 9% of LTOT patients use LOX as a portable system, suggesting that the survey sample was made up of an abnormally large group of LOX patients. For some patients, more than one alternative portable system was used when not on the POC.



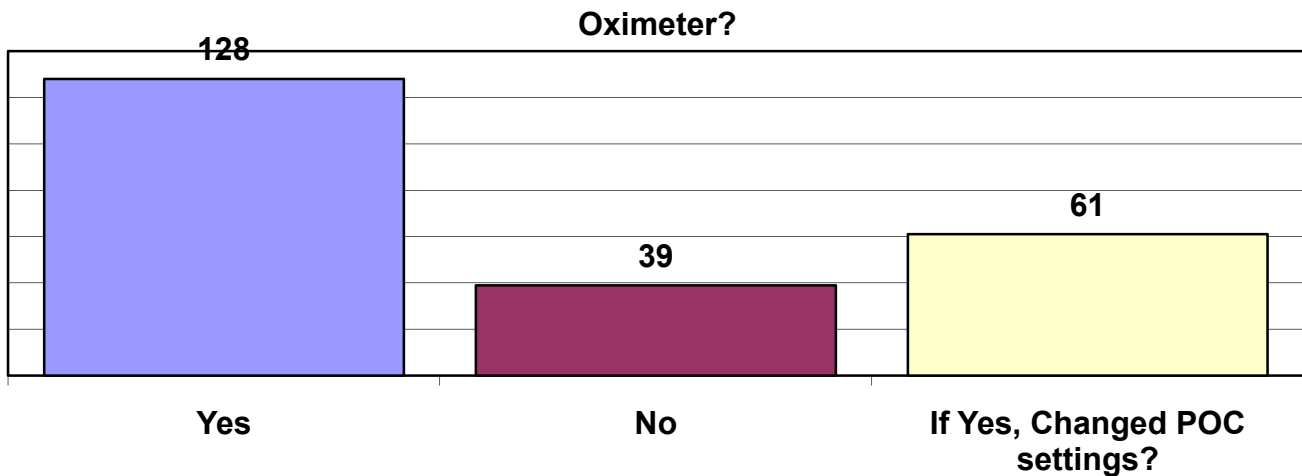
**8. Who helped you determine the oxygen settings for your POC?**

POCs are a medical device delivering a prescribed medication to the patient. Patients should be titrated on the device they will be using at all activity levels they will be using the POC. This does not usually occur. For some patients who responded to this survey, more than one resource was used to determine their oxygen setting for the POC. Some alternative answers given noted one or more of the following: They were helped by Bob McCoy or Lyn Cole; the individual themselves determined their own setting with an oximeter; and some felt that no one helped determine the proper setting or was interested in doing so.



**9. Do you have an oximeter?**

Of 128 respondents noting they have an oximeter, 61 indicated they have changed their POC settings based on the oximeter readings.

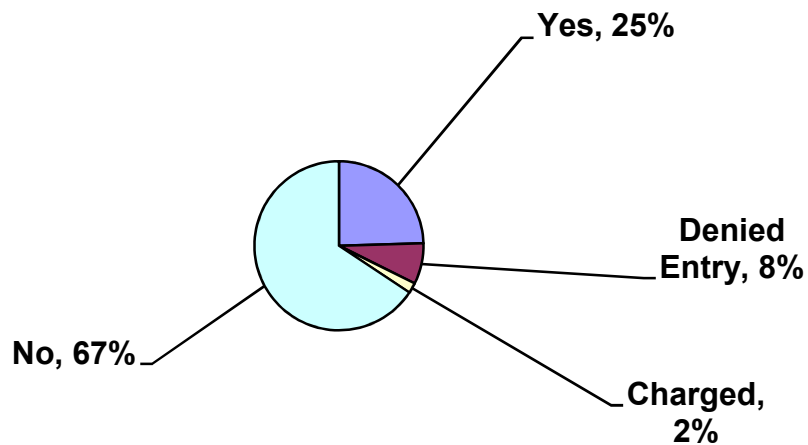


**10. Do you use your POC when sleeping?**

104 responded Yes (60%)  
69 responded No (40%)

**11. Do you take commercial airline flights with your POC?**

8% of patients who answered this survey responded that they were denied entry to an airplane with their POC. Of those who were allowed to bring their POC on a flight, 2% of them were charged an additional fee to have the unit along.

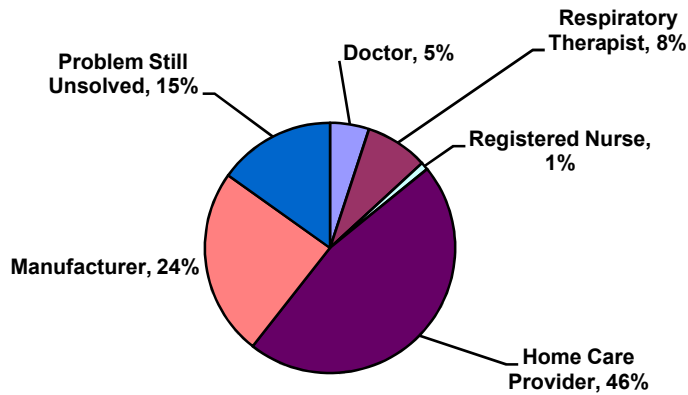


**12. Have you had a problem with your POC?**

57 of 173 respondents (30%) have had a problem with their POC. Common problems included batteries not running long enough, too much noise, backup not working properly, unknown system errors, the weight of the machine being too much, and pulsing capabilities not meeting needs.

**13. If you had a problem, who helped you solve the problem?**

74 answers were given. Home Care Providers were cited the most as having helped solve POC problems. 11 respondents (15%) indicated the problem was still unsolved.



**14. Do you feel you receive enough oxygen with the POC?**

147 (85%) responded Yes.  
25 (14%) responded No.  
1 respondent did not answer.

**15. Was the POC easy to understand and operate?**

167 (97%) responded Yes  
5 (3%) responded No.  
1 respondent did not answer.

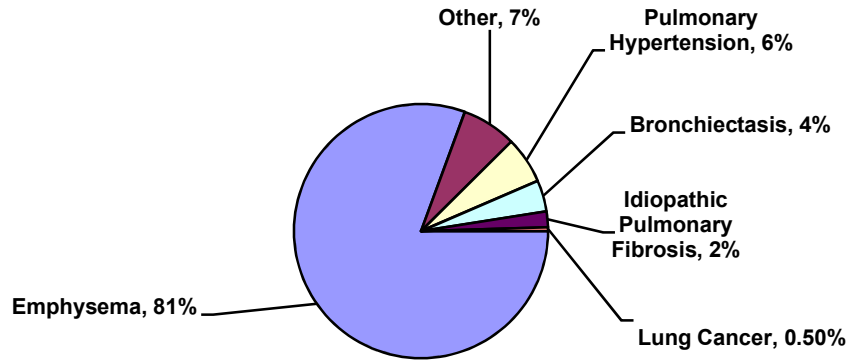
**16. Will you continue to use a POC?**

155 (90%) responded Yes.  
16 (9%) responded No.  
2 respondents did not answer.

**17. Would you recommend the use of a POC?**

155 (90%) responded Yes.  
13 (8%) responded No.  
5 respondents did not answer.

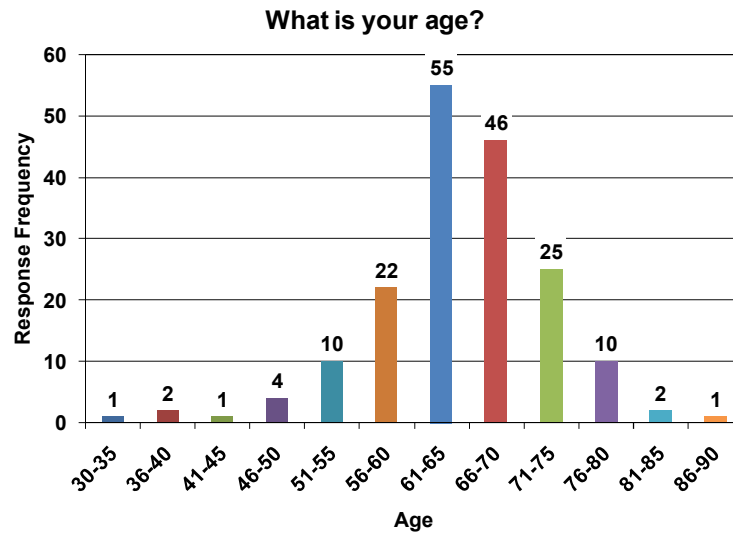
**18. What medical condition have you been diagnosed with that requires LTOT?**



Other answers: Bronchitis; Allergies; Asthma; Lung Transplant; Asbestosis; Histoplasmosis; PAVMs; Aspergillosis; Kyphoscoliosis; Respiratory Failure.

### 19. What is your age?

Mean age of all respondents was 65 years old. Minimum age reported was 35; Maximum age reported was 88.



### 20. What is your gender?

108 (62%) Female.

60 (35%) Male.

5 (3%) respondents did not specify gender.

**21. What state or province do you live in?**

Alabama (1)  
Arizona (6)  
Arkansas (4)  
British Columbia (1)  
California (27)  
Colorado (6)  
Connecticut (1)  
Delaware (1)  
Florida (11)  
Georgia (1)  
Illinois (6)  
Indiana (2)  
Iowa (2)  
Kansas (3)  
Louisiana (1)  
Maine (2)  
Maryland (2)  
Massachusetts (1)  
Michigan (5)

Minnesota (16)  
Missouri (4)  
Montana (2)  
Nebraska (5)  
New Hampshire (1)  
New Jersey (4)  
New York (13)  
North Carolina (2)  
Ohio (5)  
Oklahoma (2)  
Oregon (2)  
Pennsylvania (6)  
South Carolina (3)  
Tennessee (1)  
Texas (8)  
Utah (1)  
Virginia (12)  
Washington (3)

