

Mail Stop 3561

August 13, 2007

Via U.S. Mail

Steven Santo
Chief Executive Officer
Avantair, Inc.
4311 General Howard Drive
Clearwater, FL 33762

Re: Avantair, Inc.
Amendment No. 2 to Registration Statement on Form S-1
Filed August 8, 2007
File No. 333-142312

Dear Mr. Santo,

We have reviewed your responses to the comments in our letter dated July 18, 2007 and have the following additional comments. Please note that all page references below correspond to the marked version of your filing provided by counsel.

Interim Financial Statements for the Nine Months Ended March 31, 2007

Condensed Consolidated Statements of Cash Flows, page F-6

1. We note from your response to our prior comment 12 that you have revised Note 7 to include a discussion of the long-term debt incurred in the nine months ended March 31, 2007. Please tell us, and revise your note to disclose the nature of the \$13,545,617 borrowings under long-term notes payable that is presented on the statements of cash flows for the nine months ended March 31, 2007. Also, we note your disclosure in Note 7 that you accounted for the conversion of the amounts under the revolving credit facility to a term loan in accordance with EITF 96-19. Please note that changes in a line-of-credit or other revolving credit facility to a term loan should be accounted for under EITF 98-14. Please tell us, and revise your disclosure to indicate whether your accounting treatment of the debt modification is in accordance with EITF 98-14.

Notes to the Financial Statements

Note 8. Warrants

2. We note from your response to our prior comment 19 and your revised disclosure in Note 8 that you issued 146,000 warrants to a financial advisor in connection with the closing of the acquisition, and because the warrants were Ardent's obligation, you recorded the amount as an offset to additional paid-in capital. Please tell us, and revise your disclosure to state the value assigned to the warrants issued to the financial advisor and explain how you valued those warrants. Also, tell us why you believe it was appropriate to record the amount as an offset to paid-in capital rather than an expense, and tell us where the amount is recorded on the statement of stockholders' equity.

Other

3. The financial statements should be updated, as necessary, to comply with Rule 3-12 of Regulation S-X at the effective date of the registration statement.
4. Provide a currently dated consent from the independent public accountant in any future amendments.

* * * * *

As appropriate, please amend the registration statement in response to these comments. You may wish to provide us with marked copies of the amendment to expedite our review. Please furnish a cover letter with your amendment that keys your responses to our comments and provides any requested supplemental information. Detailed cover letters greatly facilitate our review. Please understand that we may have additional comments after reviewing your amendment and responses to our comments.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filings reviewed by the staff to be certain that they have provided all information investors require for an informed decision. Since the company and its management are in possession of all facts relating to a company's disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

We direct your attention to Rules 460 and 461 regarding requesting acceleration of a registration statement. Please allow adequate time after the filing of any amendment for further review before submitting a request for acceleration. Please provide this request at least two business days in advance of the requested effective date.

Steven Santo
Avantair, Inc.
August 13, 2007
Page 3

You may contact Claire Erlanger at (202) 551-3301 or Linda Cvrkel at (202) 551-3813 if you have questions regarding comments on the financial statements and related matters. Please contact H. Yuna Peng at (202) 551-3391 or me at (202) 551-3750 with any other questions.

Regards,

Max A. Webb
Assistant Director

cc: William Haddad, Esq.
DLA Piper US LLP
via facsimile: (212) 884-8498