



MIKE CAUSEY, INSURANCE COMMISSIONER & STATE FIRE MARSHAL
BRIAN TAYLOR, CHIEF STATE FIRE MARSHAL

December 16, 2020

Danny Gough
PO Box 745
Lewisville, NC 27023

**RE: 2004 Manual S, Section 3-4
Oversizing Heat Pump Cooling Based on Manual S Cold Climate**

Mr. Gough:

This letter is in response to your request for formal interpretation dated December 14, 2020 that was received by NC DOI by email on that date. In the request you had the following question:

Can a mechanical system designer oversize the cooling capacity of a heat pump using the 25% allowance for "cold climates" of the 2004 ACCA Manual S, Section 3-4 without justifying such sizing from the analysis outlined in 2004 ACCA Manual S?

Remarks:

Although the term "cold climate" is not defined in the manual it is explained that the intent is to allow oversizing of cooling equipment where such oversizing is justified based on design analysis and cost over the life of the system.

Conclusions:

No, it is not possible to justify the use of the 25% allowance for "cold climates" in the 2004 ACCA Manual S, Section 3-4 without an analysis as outlined in the 2004 ACCA Manual S.

As a matter of reference, a copy of your letter of request for formal interpretation (Attachment A below) is included with this letter.

Please call if you have comments or questions.

Sincerely,

Carl Martin, RA
Chief Code Consultant

cc: File
Robbie Davis, Chairman – BCC
Keith Rogers, Chairman Mechanical Code Standing Committee – BCC

ATTACHEMNT A



**APPENDIX E
APPEALS
NORTH CAROLINA
BUILDING CODE COUNCIL**
325 North Salisbury Street, Room 5_44
Raleigh, North Carolina 27603
(919) 647-0095

APPEAL TO NCDOI/NCBCC Hearing Date ____ / ____ / ____
GS 153A-374, GS 160A-434 GS 143-140, GS 143-141
Formal Interpretation by NCDOI _____ Appeal of Local Decision to NCBCC _____
Appeal of Local Decision to NCDOI _____ Appeal of NCDOI Decision to NCBCC _____

APPELLANT Danny G Gough PHONE (336) 463 - 2005 x _____
REPRESENTING Public
ADDRESS PO Box 745
CITY Lewisville STATE NC ZIP 27023
E-MAIL housedoc@yadtel.net FAX (_____) _____ - _____

North Carolina State Building Code, Volume _____ - Section _____

REQUEST ONE: Formal Interpretation by NCDOI Appeal of Local Decision to NCBCC
 Appeal of Local Decision to NCDOI Appeal of NCDOI Decision to NCBCC

Type or print. Include all background information as required by the referenced General Statutes and the attached policies. Attach additional supporting information.

This question relates to the 2012 NC Mechanical Code.
Can a mechanical system designer oversize the cooling capacity of a heat pump using the 25% allowance for "cold climates" of the 2004 ACCA Manual S, Section 3-4 without justifying such sizing from the analysis outlined in 2004 ACCA Manual S?

REASON:
To clarify confusion about the issue..

Signature *Danny G Gough* DATE: 12-14-20 **FORM 3/14/17**
APPEAL TO NCDOI/NCBCC