

## **A Collation of CRU Correspondence**

**Stephen McIntyre, May 30, 2008**

After unveiling the Hadley Center adjustment error that has been used in all temperature compilations for the past 20 years, Phil Jones<sup>1</sup>

Climate scientists should think about data quality more often, says Jones, so that there is no opportunity for incorrect data to sow seeds of doubt in people's minds about the reality of climate change.

This is the same Phil Jones who said:

We have 25 or so years invested in the work. Why should I make the data available to you, when your aim is to try and find something wrong with it. There is IPR to consider.

Over the past few years, I've posted at Climate Audit on CRU obstruction of efforts to find out even the simplest information about how they do their calculations. I've collated this correspondence on two topics:

- 1) efforts to identify the station data used in CRU temperature analyses, and, once that had been refused, efforts to obtain even a list of stations used by SRU. Two generations of inquiry are shown below, first by Warwick Hughes in 2005 and then by Willis Eschenbach in 2006-2007.
- 2) efforts to obtain a list of stations used in Jones et al 1990, a prominent study purportedly proving that the UHI effect was inconsequential. Once this list was obtained, an examination of the list of Chinese stations by myself and Doug Keenan, showed that claims in Jones et al 1990 to have selected stations based on careful examination of station history metadata could not possibly be true, as such metadata did not exist, which led Keenan to file a complaint against one of the authors.

This collation draws on previous posts at Climate Audit and my correspondence files.

## **CRU Station Data**

### ***1. Warwick Hughes***

#### **July 2004 to CRU**

Dear Jean Palutikof, Dr P.D. Jones,  
I was just reading your web page at; <http://www.cru.uea.ac.uk/cru/info/warming/> and wish to access the station by station temperature data, updated through 2001 referred to on your CRU web page; <http://www.cru.uea.ac.uk/cru/data/temperature/#datdow> as "Over land regions of the world over 3000 monthly station temperature time series are used." Where can I download the latest station by station data which is a foundation of Dr

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<sup>1</sup> [http://www.nature.com/news/2008/080528/full/453569a.html?s=news\\_rss](http://www.nature.com/news/2008/080528/full/453569a.html?s=news_rss)

Jones et al published papers ? Note, I am not asking about the CRU gridded data which I can see on your web site. Looking forward to your help,

Best wishes, Warwick Hughes

### **Jones to Hughes**

Warwick,

The station data are not on the CRU web site. If you look at the GHCN page at NCDC, you'll see they have stopped access and cited WMO Res. 40 for this. To my mind this resolution is supposed to make access free.

However, it was hinted at to me a year or two ago that I should also not make the station data available.

The gridded data are there as you know.

I would suggest you take this up with WMO and/or GCOS. I have raised it several times with them and got nowhere.

Cheers

Phil

### **Hughes Email to Jones just before 18 Feb, 2005**

Dear Phil,

Greetings from sunny Perth.

Re the issue of the non-availability of your station by station global data. I have this month emailed the WMO a couple of times with the text below this email, no response so far. I have used the following two email addresses from the "ADMINISTRATIVE DIRECTORY Offices and Departments:" on the WMO web site. First the Office of the Secretary-General(SG) and looking down their long list of Departments I selected World Climate Data and Monitoring Programme Division (WCD) with email address . I wondered if you had any suggestion for a WMO email address that might respond ?

Best wishes, Warwick Hughes

### **Hughes Email to WMO, Feb 2005**

Dear Chief Executive Officer,

World Climate Data and Monitoring Programme Division (WCD),

Last July I emailed Prof Phil Jones;

Prof. Phil Jones

Climatic Research Unit

School of Environmental Sciences

University of East Anglia  
Norwich  
NR4 7TJ  
UK

asking him for his "...station by station temperature data, updated through 2001 referred to on your CRU web page; <http://www.cru.uea.ac.uk/cru/data/temperature/#datdow> as "Over land regions of the world over 3000 monthly station temperature time series are used." Professor Jones replied to say that he had been asked to stop releasing those data.

In view of the desirability that the free flow of scientific data be maintained, I feel sure this is a misunderstanding and I look forward to you letting Prof Jones know that the WMO has no objection to him quickly passing on to me these global station by station temperature data updated as recent as possible.

I have been researching and publishing on climate science since the early 1990's, see list below.

Refereed Published Papers:

- 1992 Robert C. Balling, Jr., Sherwood B. Idso, and Warwick S. Hughes. "Long-Term and Recent Anomalous Temperature Changes in Australia." *Geophysical Research Letters*, Vol. 19, No. 23, pp. 2317-2320.
- 1995 Robert C. Balling, Jr. and Warwick S. Hughes. "Comments on "Detecting Climate Change Concurrent with Deforestation in the Amazon Basin: Which Way Has It Gone ?" *Bulletin of the American Meteorological Society*, Vol. 76, No. 4, 9. 559.
- 1995 Warwick S. Hughes. Comment on D.E. Parker, "Effects of Changing Exposure of Thermometers at Land Stations." *International Journal of Climatology*, Vol. 15, pp. 231-234.
- 1996 Warwick S. Hughes and Robert C. Balling, Jr. "Urban Influences on South African Temperature Trends." *International Journal of Climatology*, Vol. 16, No. 8, pp. 935-940. Online at <http://www.john-daly.com/s-africa.htm>
- 1997 Warwick S. Hughes. Comment on, "Historical Thermometer Exposures in Australia." by N. Nichols et al. *International Journal of Climatology*, Vol. 17, pp. 197-199.

I look forward to your assistance.  
Yours faithfully,  
Warwick S. Hughes  
Perth  
Australia

### **Jones to Hughes, Feb 18, 2005**

Warwick,

In Pune, India at the moment. Back in CRU on Monday but away then the rest of next week. WCDMP doesn't have a head at the moment as the last person retired in December. I will look at my email addresses I have on my machine at work on Monday.  
Phil

### **Jones to Hughes, Feb 21, 2005**

Subject: Re: WMO non respondo

Warwick,

Hans Teunisson will reply. He'll tell you which other people should reply. Hans is "Hans Teunissen"

I should warn you that some data we have we are not supposed to pass on to others. We can pass on the gridded data - which we do. **Even if WMO agrees, I will still not pass on the data. We have 25 or so years invested in the work. Why should I make the data available to you, when your aim is to try and find something wrong with it.** There is IPR to consider.

You can get similar data from GHCN at NCDC. Australia isn't restricted there. Several European countries are. Basically because, for example, France doesn't want the French picking up data on France from Asheville. Meteo France wants to supply data to the French on France. Same story in most of the others.

Cheers  
Phil

## ***2. Willis Eschenbach and Keenan FOI Correspondence***

### **Sep. 28, 2006 Request**

I would like to obtain a list of the meteorological stations used in the preparation of the HadCRUT3 global temperature average, and the raw data for those stations. I cannot find it anywhere on the web. The lead author for the temperature average is Dr. Phil Jones of the Climate Research Unit.

Many thanks, Willis Eschenbach

### **Feb, 10, 2007 East Anglia Reply**

Your request for information received on 28 September now been considered and I can report that the information requested is available on non-UEA websites as detailed below.

The Global Historical Climatology Network (GHCN-Monthly) page within US National Climate Data Centre website provides one of the two US versions of the global dataset and includes raw station data. This site is at:

<http://www.ncdc.noaa.gov/oa/climate/ghcn-monthly/index.php>

This page is where you can get one of the two US versions of the global dataset, and it appears that the raw station data can be obtained from this site.

Datasets named ds564.0 and ds570.0 can be found at The Climate & Global Dynamics Division (CGD) page of the Earth and Sun Systems Laboratory (ESSL) at the National Center for Atmospheric Research (NCAR) site at: <http://www.cgd.ucar.edu/cas/tn404/> Between them, these two datasets have the data which the UEA Climate Research Unit (CRU) uses to derive the HadCRUT3 analysis. The latter, NCAR site holds the raw station data (including temperature, but other variables as well). The GHCN would give their set of station data (with adjustments for all the numerous problems).

They both have a lot more data than the CRU have (in simple station number counts), but the extra are almost entirely within the USA. We have sent all our data to GHCN, so they do, in fact, possess all our data.

In accordance with S. 17 of the Freedom of Information Act 2000 this letter acts as a Refusal Notice, and the reasons for exemption are as stated below

Exemption Reason: s. 21, Information accessible to applicant via other means Some information is publicly available on external websites

If you have a complaint about the handling of your enquiry then please contact me at  
University of East Anglia  
Norwich

You also have a right of appeal to the Information Commissioner at: Information  
Commissioner's Office  
Wycliffe House

Yours sincerely

David Palmer  
Information Policy Officer  
University of East Anglia

### **March 8, 2007 2nd Iteration of FOI Request**

You are making the rather curious claim that because the data "appears" to be out on the web somewhere, there is no need for Dr. Jones to reveal which stations were actually used. The claim is even more baffling since you say that the original data used by CRU is available at the GHCN web site, and then follow that with the statement that some of the

GHCN data originally came from CRU. Which is the case? Did CRU get the data from GHCN, or did GHCN get the data from CRU?...

I am again requesting that you provide:

- 1) A list of the actual sites used by Dr. Jones in the preparation of the HadCRUT3 dataset, and
- 2) A clear indication of where the data for each site is available. This is quite important, as there are significant differences between the versions of each site's data at e.g. GHCN and NCAR.

### **2nd East Anglia Refusal, Apr 12, 2007**

In regards the "gridded network" stations, I have been informed that the Climate Research Unit's (CRU) monthly mean surface temperature dataset has been constructed principally from data available on the two websites identified in my letter of 12 March 2007. Our estimate is that more than 98% of the CRU data are on these sites.

The remaining 2% of data that is not in the websites consists of data CRU has collected from National Met Services (NMSs) in many countries of the world. In gaining access to these NMS data, we have signed agreements with many NMSs not to pass on the raw station data, but the NMSs concerned are happy for us to use the data in our gridding, and these station data are included in our gridded products, which are available from the CRU web site. These NMS-supplied data may only form a very small percentage of the database, but we have to respect their wishes and therefore this information would be exempt from disclosure under FOIA pursuant to s.41. The World Meteorological Organization has a list of all NMSs.

### **Third Iteration of FOI Request, Apr 13, 2007**

Without knowing the name and WMO number of each site and the location of the source data (NCAR, GHCN, or National Met Service), it is not possible to access the information. Thus, Exemption 21 does not apply - I still cannot access the data.

I don't understand why this is so hard. All I am asking for is a simple list of the sites and where each site's data is located. Pointing at two huge piles of data and saying, in effect, "The data is in there somewhere" does not help at all.

To clarify what I am requesting, I am only asking for a list of the stations used in HadCRUT3, a list that would look like this:

WMO#	Name	Source
58457	HangZhou	NCAR
58659	WenZhou	NCAR
59316	ShanTou	GHCN
57516	ChongQing	NMS

etc. for all of the stations used to prepare the HadCRUT3 temperature data.

That is the information requested, and it is not available "on non-UEA websites", or anywhere else that I have been able to find.

### **Apr 27, 2007 CRU Refusal**

Dear Mr. Eschenbach

FREEDOM OF INFORMATION ACT 2000 - INFORMATION REQUEST (FOI\_07-04)

Further to your email of 14 April 2007 in which you re-stated your request to see

"a list of stations used by Jones et al. to prepare the HadCRUT3 dataset" I am asking for:

- 1) A list of the actual sites used by Dr. Jones in the preparation of the HadCRUT3 dataset, and
- 2) A clear indication of where the data for each site is available. This is quite important, as there are significant differences between the versions of each site's data at e.g. GHCN and NCAR."

In your note you also requested "the name and WMO number of each site and the location of the source data (NCAR, GHCN, or National Met Service)",

I have contacted Dr. Jones and can update you on our efforts to resolve this matter.

We cannot produce a simple list with this format and with the information you described in your note of 14 April. Firstly, we do not have a list consisting solely of the sites we currently use. Our list is larger, as it includes data not used due to incomplete reference periods, for example. Additionally, even if we were able to create such a list we would not be able to link the sites with sources of data. The station database has evolved over time and the Climate Research Unit was not able to keep multiple versions of it as stations were added, amended and deleted. This was a consequence of a lack of data storage in the 1980s and early 1990s compared to what we have at our disposal currently. It is also likely that quite a few stations consist of a mixture of sources.

I have also been informed that, as the GHCN and NCAR are merely databases, the ultimate source of all data is the respective NMS in the country where the station is located. Even GHCN and NCAR can't say with precision where they got their data from as the data comes not only from each NMS, but also comes from scientists in each reporting country.

In short, we simply don't have what you are requesting. The only true source would be the NMS for each reporting country. We can, however, send a list of all stations used, but without sources. This would include locations, names and lengths of record, although the latter are no guide as to the completeness of the series.

This is, in effect, our final attempt to resolve this matter informally. If this response is not to your satisfaction, I will initiate the second stage of our internal complaint process and

will advise you of progress and outcome as appropriate. For your information, the complaint process is within our Code of Practice and can be found at:  
[http://www1.uea.ac.uk/polopoly\\_fs/1.2750!uea\\_manual\\_draft\\_04b.pdf](http://www1.uea.ac.uk/polopoly_fs/1.2750!uea_manual_draft_04b.pdf)

Yours sincerely  
David Palmer  
Information Policy Officer  
University of East Anglia

**Appeal by Willis to Information Commissioners' Office, April 2007**

[insert]

**May 21, 2007, Decision of Information Commissioners' Office**

FREEDOM OF INFORMATION ACT 2000 - INFORMATION REQUEST (FOI\_07-04)

Dear Mr Eschenbach

Following David Palmer's letter of 27th April 2007 to you regarding your dissatisfaction with our response to your FOI request of 25th January 2007, I have undertaken a thorough review of the contents of our file and have spoken with both Mr. Palmer and Professor Jones.

As a result of this investigation, I am satisfied that we have done all we can to fulfil your request and to provide you with the information you require where it is possible for us to do so.

I confirm that we are able to make available on the Climatic Research Unit website a list of stations, including name, latitude, longitude, elevation and WMO number (where available).

We are unable to provide a simple list of sources for these stations as we do not hold this information. Nor do we hold the raw (i.e. unadjusted) station data, as you describe it, at UEA. As stated in prior letters to you, raw station data are available on the NCAR and GHCN websites and gridded data are available on the Climatic Research Unit website. If these data are insufficient for your requirements, you will need to contact the NMS for the country in which the station is located to obtain the information you require.

I hope you are able to accept this response. We have contacted the Information Commissioner's Office in relation to this matter and their advice is that if you are still dissatisfied with this response, you can, at this time, exercise your right of appeal to the Information Commissioner by contacting them at:

Information Commissioner's Office  
Wycliffe House

### **May 25, 2007, Keenan Letter to Jones**

According to Steve McIntyre, some of your raw station data was obtained from National Met Services who asked you to not disclose that data. Is this correct? If so, will you send me a list of the countries with which CRU/UEA has such non-disclosure agreements? Or, if it is easier, direct me to an appropriate person to ask for this?

### **May 31, 2007 Jones Reply to Keenan**

Dear Doug,

I have done some searching in files - all from the period 1990-1998. This is the time when we were in contact with a number of NMSs. We have also got datasets from fellow scientists and other institutes around the world. All supplied data (eventually and sometimes at cost), but we were asked not to pass on the raw data to third parties, but we could use the data to develop products (our datasets) and use the data in scientific papers. It is likely that some of the NMSs and Institutes have changed their policies now - and that the people we were corresponding with (all by regular mail or fax) are no longer there or are in different sections. The lists below don't refer to all the stations within these countries, nor to all periods, but to some of the data for some of the time.

The NMSs

*Germany, Bahrain, Oman, Algeria, Japan, Slovakia and Syria*

Scientists/Institutes (data for these countries)

*Mali, India, Pakistan, Poland, Indonesia, Democratic Republic of the Congo (was Zaire), Sudan and some Caribbean Islands*

These are the only ones I can find evidence for. I'm sure there were a few others during the 1980s, but we have moved buildings twice since 1980.

Not sure how you will use this data.

Phil Jones

### **Willis to Information Commissioner, August 2007**

Thank you for your letter of May 21, 2007 in which you stated:

I confirm that we are able to make available on the Climatic Research Unit website a list of stations, including name, latitude, longitude, elevation and WMO number (where available).

I have recently consulted the CRU website and have been unable to locate the promised information. If you were waiting for an acknowledgement from me to carry out this long overdue and minimal provision of information, this is to notify you that I would like you to make this information available. In doing so, please insure that the authors state clearly that the list is a complete list of all stations used in their calculations and that no

stations in the list are not used.

I also acknowledge your refusal to provide the requested station data in the form used by CRU and will consider further options in this respect available to me.

Yours truly Willis Eschenbach

### **Oct 1, 2007 Palmer to Eschenbach: Limited Compliance**

Mr. Eschenbach,

Further to your emails of 29 August and 30 September 2007, I can advise that the information you seek is on our website at <http://www.cru.uea.ac.uk/cru/data/landstations/> <<http://www.cru.uea.ac.uk/cru/data/landstations/>> .

My apologies for the delay in responding to you. I trust this will be to your satisfaction.

Cheers, Dave Palmer

### **Jones et al 1990**

I have initially inquired about information about the identities of the stations used in this study in 2003, but had been rebuffed. I re-visited this in early 2007. I first discussed the Chinese data in a post entitled Phil Jones and The Great Leap Forward <http://www.climateaudit.org/?p=1193> .

### **Feb 20, 2007 McIntyre to Jones**

Dear Phil,

a couple of years ago, I requested the identities and data for the Russian, Chinese and Australian networks studied in Jones et al Nature 1990 on urbanization. At the time, you said that it would be unduly burdensome to locate the information among your diskettes as the study was then somewhat stale. However, I notice that Jones et al 1990 has been cited in IPCC AR4 (in the section where you were a Coordinating Lead Author) and continues to be cited in the literature (e.g. Peterson 2003).

Accordingly, I re-iterate my request for the identification of the stations and the data used for the following three Jones et al 1990 networks:

1. the west Russian network
2. the Chinese network
3. the Australian network

For each network, if a subset of the data of the data was used, e.g. 80 stations selected from a larger dataset, I would appreciate all the data in the network, including the data that was not selected.

In each case, please also provide the identification and data for the stations used in the gridded network which was used as a comparandum in this study.

Thank you for your attention.

Steve McIntyre

### **March 9, 2007 CRU Refusal under FOI**

Your request for information under the Freedom of Information Act 2000 received by us on 22 February 2007 has been considered and I am not obliged to supply the information you have requested under this Act.

The exemption applied is s. 39, exempting information that is “environmental information” within the meaning of the Environmental Information Regulations 2004 from disclosure under the Freedom of Information Act 2000.

This exemption applies because “environmental information” must be disclosed under the Environmental Information Regulations 2004 (EIR). In short, we will consider your request and provide information under EIR, not FOIA.

Your request is being considered under EIR and you will receive the information requested within the statutory timescale of 20 working days as defined by the EIR 2004, subject to the information not being exempt.

If appropriate, the information may be provided in paper copy, normal font size. If you require alternative formats, e.g. language, audio, large print, etc. then please let me know.

For your information, the EIR defines a number of exemptions which may prevent release of the information you have requested. There will be an assessment and if any of the exemption categories apply then the information will not be released. You will be informed if this is the case, including your rights of appeal.

If the information you request contains reference to a third party then they may be consulted prior to a decision being taken on whether or not to release the information to you. You will be informed if this is the case.

There may be a fee payable for this information. This will be considered and you will be informed if a fee is payable. In this event the fee must be paid before the information is processed and released. The 20 working day time limit for responses is suspended until receipt of the payment.

If you have any queries or concerns then please contact me at:  
University of East Anglia  
Norwich

You also have a right of appeal to the Information Commissioner at: Information Commissioner's Office  
Wycliffe House

**March 9, 2007 CRU Response under EIR**

Dear Mr. McIntyre  
ENVIRONMENTAL INFORMATION REGULATIONS 2004 - INFORMATION  
REQUEST (FOI\_07-09; EIR\_07-02)

Your request for information has now been considered and the information requested is enclosed.

Some of the information requested cannot, however, be disclosed and, Pursuant to Regulation 12, Environmental Information Regulations 2004, I am not obliged to supply this information. The exemptions are clearly indicated within the attached document and the reasons for exemption are as stated below

Exemption Reason

Reg. 6(1)b: Information already publicly available & easily accessible to the applicant  
Reg. 12(4)a: Information not held by the authority

The reason for claiming Regulation 6(1)(b) is that the station specific raw (i.e. daily) "urban" data requested is already accessible on publicly available websites, specifically:

- 1) The Global Historical Climatology Network (GHCN-Monthly) page within US National Climate Data Centre website at:  
<http://www.ncdc.noaa.gov/oa/climate/ghcn-monthly/index.php>, and,
- 2) the Climate & Global Dynamics Division (CGD) page of the Earth and Sun Systems Laboratory (ESSL) at the National Center for Atmospheric Research (NCAR) site at:  
<http://www.cgd.ucar.edu/cas/tn404/>

In regards Regulation 12(4)(a), the information from "rural" data stations no longer exists in the form requested at the University of East Anglia.

The public interest in claiming these exemptions is clear; in the case of Reg. 6(1)(b), information can be provided to the requester faster, and without diverting resources of the University than if the University were to provide this information directly. Clearly, we cannot provide information we do not possess, and the public interest is not at issue.

I apologise that not all of your request will be met but if you have any further information needs in the future then please contact me.

You also have the right of appeal against the decision. If you wish to appeal (or if you are dissatisfied with the handling of your request) please set out in writing your grounds of appeal and send to me at:

University of East Anglia  
Norwich, NR4 7TJ

You also have a subsequent right of appeal to the Information Commissioner at:  
Information Commissioner's Office  
Wycliffe House

Yours sincerely

David Palmer  
Information Policy Officer  
University of East Anglia

**McIntyre to Palmer, March 13, 2007**

Dear Mr Palmer,

Your reply is unresponsive to my request and not in accordance with your policies. I hereby request that you re-consider your refusal to provide the following information:

A) the identification of the stations ... for the following three Jones et al 1990 networks:

1. the west Russian network
2. the Chinese network
3. the Australian network

B) identification ... of the stations used in the gridded network which was used as a comparandum in this study

While the data for these stations may or may not exist at GHCN and/or CGD (and such data may or may not be in the version used in Jones et al 1990), it is impossible to identify the stations used in Jones et al 1990 by inspection of the GHCN or CGD data sets and your application of Reg 6(1)b cannot be justified. I would be surprised if Jones et al no longer even have a record of what stations were used in their study. Accordingly, I appeal your ruling.

Yours truly,

Stephen McIntyre

**March 15, 2007 Acknowledgement Letter**

Dear Mr. McIntyre  
FREEDOM OF INFORMATION ACT 2000 - INFORMATION REQUEST (FOI\_07-09)

I acknowledge your appeal (as defined by Lord Chancellors Code of Practice) received 12 March 2007 against the Refusal Notice of 12 March 2007 in relation to your request for information in accordance with the Freedom of Information Act 2000 received on 22 February 2007.

Your appeal is being considered pursuant to our internal complaints procedure as mandated by the Freedom of Information Act 2000 and you will receive a response within 28 days, by 9 April 2007. You can view our internal complaints procedure at:  
[http://www1.uea.ac.uk/polopoly\\_fs/1.2750!uea\\_manual\\_draft\\_04b.pdf](http://www1.uea.ac.uk/polopoly_fs/1.2750!uea_manual_draft_04b.pdf)

If you are dissatisfied with the handling of your complaint please contact me at:  
University of East Anglia  
Norwich

If you are dissatisfied with the final adjudication of your complaint by our internal complaint process, you have the right of appeal to the Information Commissioner at:  
Information Commissioner's Office  
Wycliffe House  
Water Lane

**Apr 3, 2007 Palmer to McIntyre**

Dear Mr. McIntyre  
FREEDOM OF INFORMATION ACT 2000 - INFORMATION REQUEST (FOI\_07-09)

In your email of 12 March 2007, you stated that you wished to see

"A) the identification of the stations ... for the following three Jones et al 1990 networks:

1. the west Russian network
2. the Chinese network
3. the Australian network

B) identification ... of the stations used in the gridded network which was used as a comparandum in this study"

As part of our obligation to, at first instance, try to resolve appeals informally, I have been in discussion with the relevant members of UEA and, upon further investigation and work, we have uncovered the annual input data for the paper of Dr. Jones from 1990.

This information includes locations of the sites and the annual temperature values for those sites. We are putting this information on the UEA website with accompanying explanatory text and anticipate that, due to the Easter holidays, this will be available to the public no later than Friday 13 April. We are, of course, happy to supply the url for this information as soon as we have it.

We do not have any information about why the sites for the 1990 paper were selected as Dr. Jones is unaware of how his collaborators selected the sites.

We hope that that this information satisfies your original request of 22 February that it will resolve this matter amicably and to your satisfaction.

Yours sincerely

David Palmer  
Information Policy Officer  
University of East Anglia

**April 3, 2007 McIntyre to Palmer**

Thank you for your efforts on this file. I look forward to reviewing the materials and will advise you promptly as to whether it complies with the request. Regards, Steve McIntyre

**April 11, 2007 Palmer to McIntyre**

Dear Mr. McIntyre  
ENVIRONMENTAL INFORMATION REGULATIONS 2004 - INFORMATION  
REQUEST (FOI\_07-09 ; EIR\_07-02)

Further to my email of 3 April 2007, I can now formally confirm that the information I identified in that letter has, in fact, been placed on a UEA website at the following url:

<http://www.cru.uea.ac.uk/cru/data/jonesetal1990/>

This data includes the locations of the sites and the annual temperature values and is prefaced by explanatory text. The 1990 paper data is not extensive, consisting of 6 small files, each of about a half an A4 page.

We do not have any information about why the sites for the 1990 paper were selected as Dr. Jones is unaware of how his collaborators selected the sites.

We hope that that this information satisfies your original request of 22 February that it will resolve this matter amicably and to your satisfaction.

Yours sincerely

David Palmer  
Information Policy Officer  
University of East Anglia

**April 17, 2007 McIntyre to Palmer**

Dear Mr Palmer,

Thank you for your courtesy and attention in this matter, which has successfully resolved part (A) of my request. However part (B) remains outstanding and I re-iterate my previous request for this information:

A) the identification of the stations ... for the following three Jones et al 1990 networks:

1. the west Russian network
2. the Chinese network
3. the Australian network

B) identification ... of the stations used in the gridded network which was used as a comparandum in this study

Thank you for your attention.  
Regards, Steve McIntyre

### **Palmer to McIntyre, April 19, 2007**

In your email of 17 April 2007, you re-iterated your request from your email of 12 March 2007, to see

“B) identification ... of the stations used in the gridded network which was used as a comparandum in this study”

I have been in conversation with Dr. Jones and have been advised that, in fact, we are unable to answer (B) as we do not have a copy of the station data as we had it in 1990. The station database has evolved since that time and CRU was not able to keep versions of it as stations were added, amended and deleted. This was a consequence of a lack of data storage comparable to what we have at our disposal currently.

I have been advised that the best equivalent data available is within the current version of CRUTEM3(v) or CRUTEM2(v). The latter is still available on the CRU web site, though not updated beyond 2005.

These latest versions are likely different from what was used in 1990. Australia and China have both released more data since then - it is likely that much of this was not digitized in 1990. Dr. Jones acknowledges that the grid resolution is now different, but this is again due to greater disk storage available.

The details of our updating of the raw station data is discussed in the following article:  
Jones, P.D. and Moberg, A., 2003: Hemispheric and large-scale surface air temperature variations: An extensive revision and an update to 2001. *J. Climate* 16, 206-223.

This is, in effect, our final attempt to resolve this matter informally. If this response is not to your satisfaction, I will initiate the second stage of our internal complaint process and will advise you of progress and outcome as appropriate. For your information, the complaint process is within our Code of Practice and can be found at:

[www1.uea.ac.uk/polopoly\\_fs/1.2750!uea\\_manual\\_draft\\_04b.pdf](http://www1.uea.ac.uk/polopoly_fs/1.2750!uea_manual_draft_04b.pdf)

Yours sincerely

David Palmer  
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