Contents

HIV Resistance: Data and Spin ................................................................. 2
National press stories largely misinterpreted the new study which found high levels of HIV drug resistance in U.S. patients.

Barcelona Conference Abstract, Scholarship Deadlines Early 2002 .......... 4
Online abstract submissions for the XIV International AIDS conference in Barcelona (July 7-12, 2002) need to be received by January 21 (note time zones); deadline is January 14 for paper or disk abstract submissions to be received. Scholarship applications are due February 1.

Nationally prominent speakers will address this year's conference.

AIDS Treatment News Denialist Series ................................................... 5
During the last year and a half AIDS Treatment News has published a series of articles answering fringe theories (that HIV is harmless, HIV doesn't exist, people should not be tested for HIV or take antiretrovirals if positive, etc.) Here are the references and links to all the articles in our series.

Medical Marijuana Grants: Application Deadlines January 15, May 1, and September 1 ................................................................. 5
The Marijuana Policy Project announced grants up to $50,000 for projects on law reform, especially medical marijuana.

Buyers' Club List, December 2001 ......................................................... 6
Our annual list of AIDS-related buyers' clubs and contact information.

AIDS Treatment News Index, 2001 ......................................................... 7
Annual index of this year's articles
HIV Resistance: Data and Spin

John S. James

On December 18 the first report was presented from a new study of the prevalence of drug-resistant HIV in U.S. patients in early 1999. This study found that somewhere between 50 and 78 percent of these patients (depending on how you count patients whose viral resistance could not be measured) had some degree of reduced susceptibility to at least one antiretroviral. White, gay, middle class, insured patients had the most resistance, on the average, while those with less access to care had less. The national press eagerly picked up that story; and when we got home from the ICAAC conference in Chicago where the preliminary report was presented, we found that people all over the country had heard it -- and little else from the conference.

A closer look shows that while the study results are valid (though not as surprising as they might appear), the central messages that carried the press story appear to be misinterpretations -- ones that could have future consequences for society's political will to deal with the HIV epidemic, both in the U.S. and abroad:

1. The main message that went out through the press is that drugs are not working because of resistance. In fact, as one of the researchers noted to AIDS Treatment News, the good news is that treatments are still saving lives despite viral drug resistance. And most of the press ignored the fact, brought out at a press conference at ICAAC, that many of the patients found to have resistant virus started antiretrovirals years ago with inadequate regimens, and added new drugs one at a time as they became available in the 1990s -- conditions that facilitate resistance development. Patients starting treatment today do not use drugs that way.

2. The publicly available abstract of the study, as well as statements to the press, correctly reported that resistance was associated with markers of access to care. In fact, as one of the researchers noted to AIDS Treatment News, the good news is that treatments are still saving lives despite viral drug resistance. And most of the press ignored the fact, brought out at a press conference at ICAAC, that many of the patients found to have resistant virus started antiretrovirals years ago with inadequate regimens, and added new drugs one at a time as they became available in the 1990s -- conditions that facilitate resistance development. Patients starting treatment today do not use drugs that way.
How the Study Was Done

This resistance study used samples collected in a major national survey of HIV care in the U.S., the HCSUS study (HIV Cost and Services Utilization Study). The importance of HCSUS is that while most studies describe the particular patients who are available for the researchers (through a particular medical institution or clinical trial, for example), HCSUS carefully selected a sample to be as representative as possible of all HIV-positive persons receiving medical care in the U.S. (except in the military, in prison, or in a hospital emergency department), in the first two months of 1996. HCSUS randomly selected 4042 patients and interviewed 76% of them. It found that in January and February of 1996, about 230,000 HIV-infected adults received medical care. HCSUS also found that "the patient population was disproportionately male, black, and poor," that many Americans with HIV were receiving care less than twice a year, and that the total cost of medical care for Americans with HIV was less than 1% of all direct personal health expenditures.

In the new resistance study, over 1900 plasma samples obtained from HCSUS volunteers about three years later (in late 1998 to early 1999) were analyzed using the ViroLogic PhenoSense resistance test. Sixty-three percent of these samples had a viral load of over 500 copies of HIV, and 89% of those had resistance test results (those with a viral load lower than 500 cannot be tested for resistance with standard tests). Of those who could be tested, 78% had reduced susceptibility to at least one antiretroviral.

There was confusion in news reports over whether resistance was found in 78% of the patients, or in about half of them. This is because the most conservative calculation assumed no resistance in any of the patients who could not be tested for resistance. Therefore, 78% (of those successfully tested who were found to be resistant to at least one antiretroviral) times 63% (of those eligible for resistance testing since they had a viral load of over 500 copies), gives 49% of the total study population in which reduced susceptibility to at least one antiretroviral was documented. (This calculation is approximate, because in the actual study weighting factors were used to make the sample of patients studied be more representative of the U.S. HIV patient population.) Those who could not be tested probably tended to have less resistance than the others (since most had a low viral load, indicating the drugs were probably working well), but certainly persons with viral load under 500 can have drug-resistant virus.

This study did not collect adherence information except for self-reports, and does not have enough data to look at adherence.

AIDS Treatment News talked with Dr. Nick Hellmann of Virologic, one of the authors of the resistance report. He noted that despite this viral resistance, the death rate in the U.S. has still been kept relatively low since modern combination treatment was introduced. He suspects that part of the reason is that unlike bacteria, HIV usually pays a significant price for drug resistance, and is likely to become less able to replicate and cause rapid worsening of disease. He noted that while it might be possible for HIV to evolve to be both highly resistant and highly pathogenic, this appears to be uncommon.

Comment

This study did indeed find more resistance (HIV with reduced susceptibility to antiretrovirals) than expected. But much of this result is not really surprising given the study design. The patients selected were all in care in the U.S. in early 1996, but had their blood drawn and virus tested three years later in late 1998 to early 1999. With this sampling, many of the patients would have been on antiretrovirals for a long time, giving more time for resistance to occur. Since all were in care in early 1996 and known at that time to have HIV, it is likely that many of them started on suboptimal therapies. This selection (plus the fact that resistance was tested for many drugs, and just one positive test led to the volunteer being counted as having resistant virus) may partly explain why this study found much more resistance than other studies.

The groups that started treatment earlier -- including gay men, and those with insurance -- had more resistance, probably because they had more time for it to develop (as well as more chance of having been exposed to the two-drug or one-drug antiretroviral regimens no longer in use).

Could the new publicity on high prevalence of resistance contribute to the arguments against providing antiretroviral treatment in Africa? This study only looked at the U.S. But it is reasonable to assume that if treatment is introduced correctly in African countries, the results of this U.S. study would not apply. There will be less resistance than in the U.S., if patients are started on modern regimens and managed correctly.

Also, the kinds of HIV that are not native to the U.S.
(but have been common for years in Africa and other parts of the world) have not spread here to any large extent. Quite likely the major reason is those at risk of HIV in the U.S. are far more likely to get infected by a native virus, which probably blocks infection by other HIV strains. So the media image of resistant "supervi-

The right message to take from this study is that viral resistance is a serious problem, and people should be more careful to use antiretrovirals correctly. It is also important to prevent transmission of resistant virus to persons who are HIV-negative. For those already infected, generally it is best to have HIV fully suppressed whenever antiretrovirals are used, so that there is little or no viral replication, and resistant virus cannot evolve. But for many patients this goal is not feasible. For these patients and for everyone else with HIV, we need new drugs that are more effective, less toxic, and less susceptible to viral resistance. We especially need new classes of treatments, including new targets for antiretrovirals, and immune-based therapies to help the body itself control HIV.

References

Barcelona Conference Abstract, Scholarship Deadlines Early 2002

The following deadlines are rapidly approaching for the XIV International AIDS Conference, Barcelona, Spain, July 7-12, 2002:
* January 14: Abstract submissions if by paper or disk;
* January 21: Abstract submissions online


The 2002 National Conference on African-Americans and AIDS will be held at the DC Renaissance Hotel in Washington, D.C.

Speakers include:
* Kweisi Mfume, president/CEO of The National Association for the Advancement of Colored People;
* Beny J. Primm, M.D., The Addiction Research and Treatment Corporation;
* Celia J. Maxwell, M.D., FACP, Howard University;
* Anthony S. Fauci, M.D., National Institutes of Health;
* Valerie Stone, M.D., Brown University;
* Phill Wilson, African-American HIV/AIDS Policy Training Institute;
* Robert Fullilove, Ph.D., Columbia University
* Glenn Treisman, M.D., Ph.D., Johns Hopkins University.

"This Conference is designed for clinicians who care for African-American patients infected with HIV/AIDS, nurses, pharmacists, HIV/AIDS service organization professionals, social workers, healthcare media, legislators, and other allied health professionals concerned about HIV/AIDS in African-Americans."

This year the conference must charge a $50 admission fee, which includes breakfast and lunch. There are some scholarships for people with HIV. Up to 15 hours of Category 1 CME credit will be available.

For more information, including a full list of speakers, see http://www.ncaaa.net.

AIDS Treatment News Denialist Series

In our last issue we completed our series of articles, mostly by Bruce Mirken, answering the "AIDS denialist" assertions that HIV is harmless (or does not exist), HIV treatment should be avoided, HIV-related medical tests are inaccurate and useless, etc. Here we have collected the references and links to our articles so that the whole series can be found more easily.

The first article in this series appeared in April 2000, and the last article in December 2001. The first two articles below are deliberately out of sequence, so that our summary of what the series is about can be listed first. The series actually began in the issue before the summary.

As we stated in the summary, "Our concern is not the ideas--we agree that all sorts of ideas should be explored and debated--but rather the direct translation of casual speculation and debating points into the medical care of patients with life-threatening illness."

The series:


(This flyer shortens and simplifies the survival article in issue #350. Agencies can reproduce it as an easy-to-read backgrounder for clients.)


(Easy language version of the CD4 and viral load article in issue #341, above.)

"HIV Testing 101 (Part 1 of 2)," by Bruce Mirken, AIDS Treatment News #374 http://www.aids.org/immunet/atn.nsf/page/a-374-05


The following articles are not part of the same series, but are related:

"Treatment Interruption: Experts Sound Cautious Note at San Francisco Forum; Meeting Proceeds Despite Disruption," by Bruce Mirken, AIDS Treatment News #341 http://www.aids.org/immunet/atn.nsf/page/a-341-01

(This meeting on treatment interruption was invaded by about a dozen AIDS denialists, resulting in minor injury to a member of the staff of Project Inform, the meeting organizer.)


Medical Marijuana Grants: Application Deadlines January 15, May 1, and September 1

On January 3 the Marijuana Policy Project in Washington D.C. announced that grants up to $50,000 will be awarded to "organizations and projects that articulate effective tactics and strategies to regulate marijuana similarly to alcohol and to make marijuana available for medical use. Grants will not be awarded to hemp-related projects, state ballot initiatives, or political campaigns." (But a major focus will be changing marijuana laws in specific jurisdictions -- especially passing medical marijuana bills in Maryland, New Mexico, and Vermont.)

The deadline for the first round of grant submissions is January 15, 2002, and the first round checks will be issued by March 31, 2002. For those who miss the January 15 deadline, the deadlines for the next rounds are scheduled for May 1 and September 1.

For more information and instructions for applying, see http://www.mpp.org/grants/index.html. Or contact the grants department of the Marijuana Policy Project, 202-462-5747 ext. 270.
Buyers' Club List,
December 2001

*AIDS Treatment News* publishes a buyers' club list each December. For a short overview and introduction to the meaning, history, and services of these organizations, see *AIDS Treatment News* #309, December 18, 1998.

We focus on buyers' clubs specializing in HIV (we also included Rainbow Grocery in San Francisco, because of its extensive selection of supplements and excellent information about them). All the organizations listed below are nonprofit. Most can provide products by mail order. Most have fact sheets or other information, and some have a nutritionist or other expert available at certain times to answer questions. Some offer financial assistance with purchases if necessary. Most are open to the public, but some require membership (which may require an annual fee, or be restricted geographically or in other ways). Call ahead for current information.

We have not listed medical marijuana buyers' clubs here. The best way to find out about any in your area is by referral from a local AIDS service organization, support group, or healthcare professional.

**Arizona**

Being Alive Buyers' Club
http://www.apaz.org/ (click "Buyer's Club")
edgarr@apaz.org
1427 North Third St., Phoenix AZ 85004
602-253-2437, fax: 602-253-5577

Travis Wright Memorial Buyers' Club
Southern Arizona AIDS Foundation Buyers' Club
http://www.saaf.org/BChome.htm
info@saaf.org
375 S. Euclid Ave, Tucson AZ 85719
800-771-9054 or 520-628-7223
fax: 520-628-7222; TTY: 800/367-8937

**California**

Rainbow Grocery Cooperative (20% PWA discount, with the Helping Hand card)
http://www.rainbowgrocery.org/ (no products online 12/01)
vitamins@rainbowgrocery.org
1745 Folsom St., San Francisco CA 94103
415-863-0620

**Colorado**

Denver Buyers' Club (PWA Coalition Colorado)
1290 Williams St., Suite 102
Mailing address: P.O. Box 300339, Denver CO 80203-0339
303-329-9379, fax: 303-329-9381, pwacolo@aol.com
Bilingual Spanish/English TTY: thru operator

**District of Columbia**

Carl Vogel Center
http://www.carlvogelcenter.org
cvc@erols.com
1012 14th St. NW, Suite 707, Washington DC 20005
202-638-0750, fax: 202-638-0749

Membership: annual cost $25 (includes a BIA test, reduced prices for massage acupuncture, educational symposium, newsletter, reduced prices for supplements).

**Georgia**

AIDS Treatment Initiatives
http://www.aidstreatment.org
info@aidstreatment.org
159 Ralph McGill Blvd. NE Suite 510, Atlanta GA 30308-3311
888-874-4845 or 404-659-2437
fax: 404-659-2438

**Massachusetts**

Treatment Information Network's/Boston Buyers' Club
http://www.vitatime.com/
bosbuyrclb@aol.com
Boston Living Center, 29 Stanhope St., 3rd Floor
Boston MA 02116
800-435-5586, or 617-266-2223
fax: 617-450-9412

**New York**

DAAIR (Direct Access Alternative Information Resources)
http://www.daair.org
email: info@daair.org
31 East 30th St. #2A, New York NY 10016
888-951-5433 or 212-725-6994
fax: 212-689-6471

Note: The largest buyers' club. Membership by sliding scale, $5, $10, or $25 per year; new members receive treatment information pack. Also, "Preventing and Managing Side Effects and HIV Symptoms" is available at http://www.daair.org (no membership required -- click the Countering Toxicities button on the home page), or by mail by request if necessary.

**Texas**

Houston Buyers' Club
http://www.houstonbuyersclub.com/
hbc@neosoft.com
3400 Montrose Blvd. #605, Houston TX 77006
800-350-2392
713-520-5288, fax: 713-521-7419

Note: *How to Manage Side Effects*, a 48-page booklet by Lark Lands, Michael Mooney, Nelson Vergel, and others is available without charge. You can request a copy by phone, mail, or email.
<table>
<thead>
<tr>
<th>Topic</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>20th year of AIDS</td>
<td>364</td>
</tr>
<tr>
<td>911</td>
<td>371</td>
</tr>
<tr>
<td>Abacavir</td>
<td>373</td>
</tr>
<tr>
<td>Access, international (see Global epidemic)</td>
<td></td>
</tr>
<tr>
<td>ACT UP Philadelphia</td>
<td>367</td>
</tr>
<tr>
<td>ADAP program</td>
<td>366</td>
</tr>
<tr>
<td>ADAP program</td>
<td>371</td>
</tr>
<tr>
<td>Africa (see also South Africa)</td>
<td></td>
</tr>
<tr>
<td>Africa -- home care</td>
<td>361</td>
</tr>
<tr>
<td>Africa</td>
<td>359</td>
</tr>
<tr>
<td>Africa</td>
<td>360</td>
</tr>
<tr>
<td>Africa</td>
<td>363</td>
</tr>
<tr>
<td>Africa</td>
<td>371</td>
</tr>
<tr>
<td>Africa</td>
<td>372</td>
</tr>
<tr>
<td>Africa</td>
<td>373</td>
</tr>
<tr>
<td>African American conference</td>
<td>376</td>
</tr>
<tr>
<td>African Americans</td>
<td>359</td>
</tr>
<tr>
<td>Agenerase</td>
<td>373</td>
</tr>
<tr>
<td>AIDS research -- 20 views</td>
<td>368</td>
</tr>
<tr>
<td>AIDS Treatment Activist Coalition</td>
<td>370</td>
</tr>
<tr>
<td>AIDSWatch</td>
<td>362</td>
</tr>
<tr>
<td>AmFAR HIV/AIDS Treatment Directory</td>
<td>363</td>
</tr>
<tr>
<td>AmFAR Treatment Insider</td>
<td>362</td>
</tr>
<tr>
<td>Amprenavir</td>
<td>373</td>
</tr>
<tr>
<td>Antibodies and HIV</td>
<td>365</td>
</tr>
<tr>
<td>Antibody testing</td>
<td>374</td>
</tr>
<tr>
<td>Antibody testing</td>
<td>375</td>
</tr>
<tr>
<td>Antiretrovirals list</td>
<td>372</td>
</tr>
<tr>
<td>ATAC</td>
<td>370</td>
</tr>
<tr>
<td>Barcelona (see International AIDS Conference)</td>
<td></td>
</tr>
<tr>
<td>Bioterrorism--immune research</td>
<td>373</td>
</tr>
<tr>
<td>Bone disease</td>
<td>366</td>
</tr>
<tr>
<td>Brazil</td>
<td>359</td>
</tr>
<tr>
<td>Bristol-Myers Squibb</td>
<td>361</td>
</tr>
<tr>
<td>Buenos Aires conference</td>
<td>368</td>
</tr>
<tr>
<td>Buenos Aires conference</td>
<td>369</td>
</tr>
<tr>
<td>Burkina Faso</td>
<td>363</td>
</tr>
<tr>
<td>Busch, Barry</td>
<td>367</td>
</tr>
<tr>
<td>Buyers' club list</td>
<td>376</td>
</tr>
<tr>
<td>Cameron, Justice Edwin</td>
<td>368</td>
</tr>
<tr>
<td>CD4 count</td>
<td>364</td>
</tr>
<tr>
<td>Civil society</td>
<td>365</td>
</tr>
<tr>
<td>Cohen, Jon</td>
<td>367</td>
</tr>
<tr>
<td>Coinfection (HIV and HCV)</td>
<td>371</td>
</tr>
<tr>
<td>Conference reports on Web</td>
<td>373</td>
</tr>
<tr>
<td>Counterfeit drugs</td>
<td>365</td>
</tr>
</tbody>
</table>
Intellectual property (see also Global epidemic)
Intellectual property 359
Intellectual property 360
Intellectual property 363
Intellectual property 371
Interaction, garlic & saquinavir 375
Intermittent treatment 375
International (see Global epidemic)
International AIDS Candlelight Memorial 364
International AIDS Conference 372
International AIDS Conference 376
Johns Hopkins Report 361
Kaletra 362
Kaletra 373
Liver (see Hepatitis)
Liver fibrosis 370
Malawi 371
Marijuana Policy Project 376
Maternal infant transmission 364
Maternal transmission lawsuit 374
Medical marijuana 376
Medscape 369
Merck 361
Merck 367
Mirken, Bruce 376
Mitochondrial toxicity 366
MSF 361
Names reporting 367
NATAF 370
Nevirapine 358
Nevirapine 374
New Mexico AIDS InfoNet 358
North American AIDS Treatment Action Forum 370
Pediatric AIDS 374
Pharmacokinetics 375
Pipeline (HIV drugs) 372
Post-exposure prophylaxis 358
Pregnancy 358
Protease inhibitors 370
Protease inhibitors 375
Research -- 20 views 368
Resistance conference 368
Resistance prevalence 376
Resistance tests 374
Retroviruses conference 2001 359
Retroviruses conference 2001 361
Retroviruses conference 2002 372
Richman, Douglas 376
Salvage therapy 362
San Francisco 359
Saquinavir 373
Saquinavir 375
Scondras, David 371
Social organization 367
South Africa 359
South Africa 360
South Africa 361
South Africa 364
South Africa 368
South Africa 374
STI (structured treatment interruption) 369
Structured intermittent therapy 375
Sustiva 362
Sustiva 373
Syringe prescription 364
T-20 373
TAG (Treatment Action Campaign) 364
TAG (Treatment Action Group) 364
TAG (Treatment Action Group) 369
T-cell (CD4) count 364
Tenofovir 360
Tenofovir 364
Tenofovir 370
Tenofovir approved 373
Therapeutic drug monitoring 363
Trade rules 371
Treatment access 359
Treatment guidelines (see Guidelines) 361
Treatment interruption 369
Treatment vs. prevention controversy 362
Treatment vs. prevention controversy 365
Tuberculosis guidelines 371
Twinning organizations 363
UNGASS 359
UNGASS 365
UNGASS 366
UNGASS 367
United Nations (see UNGASS) 359
Vaccines 367
Viral load 6-day changes 374
Viral load 364
Viramune 374
ViroLogic 376
Women, treatment 368
Women, treatment 372
World AIDS Day 373
Ziagen 373

AIDS Treatment News #376, December 28, 2001