



## Canadian HIV/AIDS Pharmacists Network (CHAP) Newsletter - September 2000

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### **Hello Network Members!**

I was originally going to send out a “summer” newsletter, however I thought by the time it reaches all of you it will likely be early September. It is hard to believe that the summer is almost over! I hope all of you had a chance to enjoy a little R&R over the summer months.....

### **New (and Old) Members**

I would like to officially welcome our new member:

Jinell Mah Ming has recently started as the pharmacist at the Southern Alberta Clinic after completing her hospital pharmacy practice residency with the Calgary Regional Health Authority. As you may recall, Kimberly Montgomery has moved to Newfoundland with her new husband. Welcome Jinell! Jinell’s email is [Jinell.MahMing@CRHA-Health.ab.ca](mailto:Jinell.MahMing@CRHA-Health.ab.ca).

We also have a returning (old) member – I do not mean “old” in terms of age!

Our past “Madame Chair” (Kathy) is back from maternity leave (albeit reluctantly). She can be reached at her old email: [rxkls@qe2-hsc.ns.ca](mailto:rxkls@qe2-hsc.ns.ca)

Finally, there are a couple of “new” members on the email distribution list. Michelle Foisy has returned from her travels and has recently accepted a position with the Capital Health Authority in Edmonton. Michelle is the Infectious Disease Pharmacy Specialist with the CHA. Her new email is [mfoisy@cha.ab.ca](mailto:mfoisy@cha.ab.ca). Also, Jeff Kapler is a part-time pharmacist with the Southern Alberta Clinic. Jeff’s email is [jeff.kapler@crha-health.ab.ca](mailto:jeff.kapler@crha-health.ab.ca).

## **Upcoming Conferences**

### ***ICAAC***

The 40<sup>th</sup> ICAAC is coming up in Toronto from September 17 – 20, 2000. I am sure that many of you will be going...

### ***Retrovirus Conference***

Alice informed me that there was reference to the retrovirus fiasco in the President's column in the Summer SIDP newsletter. Apparently Dr. Benson said the committee will revise the decision to limit pharmacist registration in future conferences based solely on professional degrees. "In addition, we appreciate the concerns similarly expressed by our colleagues at ACCP, ASHP, and the Canadian HIV/AIDS Pharmacists Network on this issue". So... we will have to see what this really means....

I have not heard the dates for the upcoming retrovirus conference but will circulate this via email as soon as more information is available.

## **Drug Availability - Updates**

### ***Rifabutin***

(Linda)

We were planning to start a patient on MAC treatment, but found out the company, Pharmacia Upjohn says their batch of Rifabutin expires June 30 & there won't be another available til September. This is the 1st I've heard of this and wondered if you have suggestions for the best alternative treatment. We were planning on using Ethambutol 1600mg daily + Clarithromycin 500mg po bid with the Rifabutin (AND the dosing was changed b/c he's on Nelfinavir -- e.g. 150mg Rifabutin daily and incr Nelfinavir 1000mg po tid). Do we just go with the 2 drugs?

(Marie)

Unless the patient has proven resistance or has failed prophylaxis the physicians here use only 2 drugs.

(Christine)

We usually go with just a macrolide and ethambutol (unless resistance, failure).

### ***Sulfadiazine***

(Deborah)

What is everyone using for toxo now that sulfadiazine is no longer available? I have a patient who is on suppressive therapy with sulfadiazine & pyrimethamine, who originally failed clindamycin during her primary treatment. Other suggested options have included atovaquone, azithro or clarithromycin. I'm curious as to what others are doing.

(Deborah)

I called the company about this (Stanley) and they told me that they are not going to be producing the product anymore and, to their knowledge, no other company is picking it up either. They also told me, however, that the decision is not yet "final" (whatever that means!) so while they have no stock left on hand, they are interested in hearing what quantities our institution purchases on a monthly basis, so that they can take this into consideration before "finalizing" the decision.

Would you mind sending me the phone numbers of the US distributors who will send to Canada? Is there a special procedure to follow to obtain this from the US? The patient has about 2 week supply left, and she has been desensitized so we are scrambling to have something in place before she runs out. (By the way, CD4 30 - up from 25! and VL pending but has been in the 5 log range)

(Laura)

The Manufacturer is EON Labs (1 800 366-1595) - but they do not have a licence to export to Canada. They say that their distributors should be able to send to Canada - I'm not sure about the procedure.

Distributors are:

Amerisource (612) 941-9550

Anda -generics (800) 331-2632

Giant Food (410) 995-4100

## **Clinical Pearls**

### ***1. Hypersensitivity Reaction following Reintroduction of Abacavir***

#### **IMPORTANT DRUG WARNING**

July 2000

Re: Severe Hypersensitivity Reactions following reintroduction with ZIAGEN® (abacavir sulfate) Products

Dear Health Care Provider,

Glaxo Wellcome Inc. is writing to inform you of important new safety information about hypersensitivity reactions to abacavir, a nucleoside analogue reverse transcriptase inhibitor which, in combination with other antiretroviral agents, is indicated for the treatment of HIV-1 infection. Fatal hypersensitivity reactions are a described risk associated with the use of abacavir (Ziagen); patients who have developed hypersensitivity reactions upon abacavir rechallenge are at an increased risk of a severe hypersensitivity reaction, which may result in death.

Recent reports indicate that severe or fatal hypersensitivity reactions can occur within hours after ZIAGEN reintroduction in patients who have no identified history or unrecognized symptoms of hypersensitivity to abacavir therapy. In these reports:

Hypersensitivity to abacavir was not recognized before abacavir therapy was interrupted. Most of these hypersensitivity reactions were indistinguishable from hypersensitivity reactions associated with abacavir rechallenge: short time to onset, increased severity of symptoms, and poor outcome (including death). Reasons for discontinuation of abacavir included interruption in drug supply and discontinuation of abacavir while treating other medical conditions. Severe or fatal hypersensitivity reactions occurred upon reintroduction when abacavir was discontinued for reasons unrelated to symptoms of hypersensitivity.

In some cases, symptoms consistent with hypersensitivity may have been present before abacavir was discontinued, but may have been attributed to other medical conditions (for example, acute onset respiratory diseases, gastroenteritis or reactions to other medications). Hypersensitivity reactions occurred days to weeks following abacavir reintroduction in a minority of reports.

If abacavir has been discontinued for reasons other than symptoms of hypersensitivity, and if reinitiation of Ziagen therapy is under consideration:

The reason for discontinuation should be evaluated to ensure that the patient did not have symptoms of a hypersensitivity reaction. If hypersensitivity is suspected, abacavir should NOT be reintroduced. If symptoms consistent with hypersensitivity are not identified, reintroduction should be undertaken with caution. Patients should be made aware that a hypersensitivity reaction can occur upon reintroduction of abacavir, and that reintroduction should be undertaken only if medical care can be readily accessed by the patient and others.

## ***2. Revised labelling of didanosine once daily***

August 1, 2000

### IMPORTANT PRESCRIBING INFORMATION

RE: Revised prescribing information regarding the preferred twice-daily dosing for VIDEX® (didanosine) based on new study results

Dear Healthcare Provider,

Bristol-Myers Squibb Company (BMS) would like to bring to your attention a change in the prescribing information for VIDEX® (didanosine), a nucleoside analogue reverse transcriptase inhibitor indicated for use in combination with other antiretroviral drugs for the treatment of HIV-1 infection. The results of a recently completed clinical trial demonstrated that the 48-week virologic response in the study arm containing VIDEX® (once-daily) was significantly lower than observed in the comparator arm. Although once daily dosing is available, it should only be considered for adult patients whose management requires once-daily administration of VIDEX®. Therefore, the preferred dosing frequency of VIDEX® is twice-daily because there is more evidence to support the effectiveness of this dosing frequency.

BMS study AI454-148 was a 48-week randomized open-label comparison of VIDEX® administered once-daily in combination with stavudine (d4T) and nelfinavir (NLF) versus zidovudine (AZT)/lamivudine (3TC)/nelfinavir (NLF) in 756 treatment naïve HIV-1 infected adult patients. The availability of once-daily dosing was based on an interim 24-week analysis in which similar antiviral activity was observed in both regimens. The results of the 48-week final analysis demonstrated a significant difference in virologic response between the VIDEX® once-daily/d4T/NLF and the AZT/3TC/NLF regimens in the proportion of patients with HIV-RNA <400 c/mL, 50% and 59%, respectively. In an analysis of patients with HIV RNA <50 c/mL at 48-weeks, 34% of VIDEX® once-daily/d4T/NLF-treated patients were below the limit of detection compared to 47% of the AZT/3TC/NLF-treated patients. Immunologic response, as measured by CD4 cell counts, was comparable between the treatment arms.

In conclusion, the treatment response rate at 48 weeks for the regimen containing VIDEX® (once daily) was significantly lower than the comparator arm. The prescribing information for VIDEX® has been revised to reflect the results of study 148; the preferred dosing frequency of VIDEX® is twice-daily. Although once-daily dosing frequency is available, it should only be considered for patients whose management requires once-daily dosing of VIDEX®. These data and recommendations are presented for your information when determining the optimal VIDEX® dosing frequency for your patients.

(Laura)

I just spoke to BMS - It seems as though the statement is based on 48 week follow-up of the originally presented 24 week Gathe J study (39th ICAAC Abs 1973). The 24 week data led to ddl's approval by FDA. But now the 48 week results suggest that once daily is not as good as twice daily. They also said that they are drafting a canadian version of the dear doctor letter that will be sent to pharmacies and physicians.

(Ann)

This is a copy of the email that I sent out to the BC folks the other day about the DDI issue. The interpretation of the study is flawed, in our

view, and does not justify the conclusions as outlined in the email below. Also, it is related to the DDI 200mg enteric coated tablet formulation which we don't have in Canada. There has been no head to head trial of OD vs BID dosing. We are NOT going to stop using once daily DDI at this time. BMS Canada seems to have the same concerns as we do as well as the concern as to how this will affect their submission to HPB for the enteric coated 200mg tabs.

(Kathy)

We are following Ann's lead. The study has a number of flaws & previous data suggested that once daily is useful therefore for the time being we are NOT switching. To be continued.....

### **3. Desensitization Protocols**

(Debbie)

Does anyone know of any desensitization protocols or have any personal experience with desensitizing a patient to an NNRTI? More specifically, I am looking for something for efavirenz or delavirdine .

### **4. Salvage Regimens**

(Linda)

We have 1 VERY complicated case where we have never been able to bring the VL to undetectable or even close. He is definitely compliant -- we feel he just has an especially virulent virus. However, my question is I'm not familiar enough with the DIs when using EFV with PIs (His genotyping indicates:

R - AZT, d4T & all PIs

Possible R - ddl, ddC, 3TC, ABC

No mutations with the NNRTIs

1st tx = 3TC, AZT, IDV for 3y JI/96-Mar3/99 -- VL = 13,000 (CD=190)

2nd tx = d4T + ddl + SQV/RTV Mar3 - Jan 14, 2000 (chg d4T to 3TC Nov/99) -- V = 21,000 (CD=183)

Last tx = EFV + NFV + 3TC + d4T Jan 14 - Mar15/2000 -- VL = 14,000 (CD=197)

Stopped all meds Mar 15 -- weekly CD4 counts & now it's 58 & VL 160,000

What do we choose?

ABC + 3TC + EFV + IDV/rtv -- would this be reasonable? What are the drug interactions? Thanks for any assistance.

(Yasmin)

A minimum dose of 200mg of ritonavir shuts down hepatic 3A4 and should be adequate to prevent EFV induction. Therefore you can use whatever RTV-IDV dose you desire.

(Alice)

I might try to include amprenavir + lopinavir + efavirenz + 2 NRTIs to add some more novel agents to the mix. Would have to use higher lopinavir dose (533 mg/133 mg BID) with efavirenz, or if it's not possible to get extra lopinavir capsules through expanded access, add another 100 mg BID of ritonavir.

(Christine)

Was genotyping done while he was on his last regimen or after he stopped? This may impact the reliability of genotyping, particularly with respect to NNRTI mutations. If the patient was on a drug holiday when genotyping was done, it is possible that he has NNRTI mutations which may re-appear in the presence of drug pressure. It is difficult to say..

I would agree with Alice that it is probably best to use as many "unique" agents as possible. At a minimum, I would use lopinavir + efavirenz + 2 NRTIs. The addition of at least one more drug would be a good idea and amprenavir may be a good option. We have not had much luck with the use of amprenavir due to the pill burden, tolerability, and cross-resistance however it is worth a shot.

(Laura)

About your case... I don't know if you have already decided on a regimen but, I also think that if genotyping was done while your patient was on a drug holiday - the absence of NNRTI mutations may not be reliable.

The efavirenz K103 mutation is likely the first to develop in a efavirenz/nelfinavir regimen. So I don't know if you could count on an NNRTI to add much to the regimen. (Anton ED, Development of HIV-1 genotypic resistance in patients failing efavirenz + nelfinavir combination therapy. IDSA 1999 Abst 320).

In addition, in ACTG 398, when patients already experienced in efavirenz, received efavirenz again (plus 2 new PIs) in a salvage regimen, there was only a 10% response rate. (7th CROI, Mellors J et al).

For ABT-378/r (lopinavir) , although the response looks good from the PI-experienced trial, it was conducted in patients with experience with 1 protease inhibitor only. And it was in NNRTI naive patients. In your patient (with significant PI resistance and likely NNRTI resistance), I don't think you can bank on lopinavir + efavirenz + 2 nukes (that would be adding only 1 real new agent).

In our patients with similar treatment experience/responses, if they have some CD4's we are trying holding regimens until some new drugs come along to be able to use with lopinavir. If their CD4s are low (like your patient), we are using lopinavir/amprenavir/+ 3 nukes and discussing with the patient that we may not get virologic response but are hoping for immunologic response.

For your patient, maybe lopinavir 3 caps bid/amprenavir 750 bid/ddI/abacavir/3TC could be considered. If he (by freak chance!) is tolerating the regimen ok, then consider increasing the dose of the amprenavir to try to beat the virus with higher concentrations). Because of the blunted CD4 response with hydroxyurea, if ANC is ok ( $>0.7$ ), maybe consider adding hydroxyurea in 2-3 months to add some kick to the ddI? One thought, is to offer the abacavir/3TC/amprenavir as a liquid to decrease pill burden. Check if the amprenavir liquid (with all the propylene glycol) is ok for your patient. Good luck!

## **5. Fusion Inhibitors**

(Marie)

Has anyone of you heard if there is any trial going on in Canada for the newer class agents?

(Deborah)

Roche has a study on-going with T-20, and I believe there are only 2 Canadian sites (not sure which ones). We did not qualify to be a site, due to our small clinic size.

(Pierre)

The Ottawa Hospital research committee met with Glaxo last week and here are the latest rumors:

- Glaxo interviewed 12 centers in Canada and will likely select 5 of them to participate in the study.
- Protocol is not yet finalized. Apparently a draft will be submitted in October.

I don't know if there is an ongoing study but there will be a new one coming shortly. We believe OH has chances to qualify for this study. Nothing is confirmed though.

## **6. Serostim**

(Laura)

Are you seeing much serostim use?

A new patient received a 3 month course of serostim last year after fighting with his insurance company for coverage. He is not clinically wasted, nor does he have any lipodystrophy. He claims that it gave him energy. Now, he wants a GP in our clinic to prescribe another 3 month course so he can go back to work in the fall. He never had any side effects from the first course (ie arthralgias etc).

I realize from the Schambelaen studies, that is indicated for clinically evident HIV-wasting (usually a 6 month course). Also, Steven Deeks will consider prescribing it for his patients if they are advanced (even without clinically evident wasting), or with patients with low CD4 counts, dropping CD4 counts or those with long-standing unsuppressed virus. (on the rationale that body composition changes and wasting may be in progress before it is clinically evident).

We are leaning towards telling this patient that there really isn't any justification for serostim use. He is working out and is not testosterone depleted. However, if any of you have more experience seeing this drug being prescribed - please let me know if you have any words of wisdom.

## **7. Efavirenz Preparation**

(Deborah)

Hope someone can help. We have a stepped reintroduction protocol for Sustiva for a patient which involves starting with a 0.5mg dose, increasing over 2 weeks to full dose. Need to find a recipe for an extemporaneous prep that will allow us to obtain this minute dose.

DuPont of no help. Will not release pediatric suspension for non-pediatric use. By the way, does anyone know the concentration of this product?

Protocol came from Drug Safety Clinic, but have not been able to obtain a recipe to date for making the Sustiva preparation. Does anyone have any suggestions?

(Natalie)

When I spoke to Dupont a few months ago, they did not have a final formulation or strength for the liquid. Our expanded access program binder does not have a final strength in the protocol. As a pediatric hospital, we are very reluctant to make an oral suspension of any drug that we do not have documented stability. We will make powders in those cases using lactose as our filler to 200mg (dispensing limit). These is a very tedious process that we try and avoid. The powder in the capsule has a very peppery unpleasant taste.

## **8. Travel**

(Kathy)

2 quick questions:

1. Nikola asked a similar question last year, just wondering if there has been an update with regards to a PI/mefloquine interaction. I have a pt on nelfinavir who is also going to be on mefloquine. Yasmin said that

they (last year) had some data on mefloquine decreasing RTV levels by 30-40%. Has anyone else seen or heard anything about nelfinavir & mefloquine??

2. My patient also need to receive a live vaccine for Yellow Fever. Are all live vaccines Contraindicated in HIV patients. I can't find any guidelines.

(Kathy)

Live vaccines are NOT recommended but my pt says he has a friend in the States who had yellow fever vaccine ie his Doc let him get it b/c his T cells were high. Go figure. I guess it is a benefit vs risk. They won't let him into Peru without it. Just wondering if anyone has had a pt who has received it.

(Pierre)

1) Good question. Nelfinavir trough is barely therapeutic alone, it surely can not stand a 30% decrease..... Unfortunately, I can't go knock at Yasmin's door anymore (we definitely miss her)..... and I don't have experience with that combination.

2) We haven't had to give Yellow vaccine to one of our patient yet. As a general rule, we do not give live vaccines to HIV patients. However, if really needed, we would give it to somebody with a preserved immune function (??? definition; likely CD4 > 200 as a minimum). It's really a risk/benefit issue

(Kathy)

Glenda gave me some really juicy tidbits of info. I also found a great source of info on the Health Canada Website. [www.hc-sc.gc.ca](http://www.hc-sc.gc.ca) This is a great site to bookmark. It has a new updated (as of 2000 ) section on malaria prophylaxis and travel for the HIV patient. Go figure!!!! Thanks to all that replied.

(Laura)

From your email, I wasn't sure if you had the poster for Yasmin's study. Here it is in case. Khaliq Y, Gallicano K, Cameron DW, et al. Mefloquine decreases ritonavir exposure in healthy volunteers. Program and abstracts of the 7th Conference on Retroviruses and Opportunistic Infections; January 30-February 2, 2000; San Francisco, Calif. Abstract 92.

For the yellow fever vaccine - I wrote a question to the Joel Gallant at the Hopkin's website on behalf of one of the docs here at the clinic (S O'keefe).

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Hi there:

We have an HIV infected woman travelling to an area where there is high risk of yellow fever transmission. Some references recommend against the vaccine as it is a live-vaccine. Other references have suggested administering the vaccine. Any suggestions?

Dr. Steven O'Keefe

Dr. O'Keefe,  
Yellow fever vaccine is a live virus vaccine and is therefore considered contraindicated for HIV-infected patients. If a stamp is needed for the vaccination certificate, I usually try to prevail upon the relevant agency to fib a little and provide the stamp without giving the vaccine. HIV-infected individuals who are traveling to areas where yellow fever is endemic (and not just to countries requiring vaccination) should either reconsider their travel plans or be very careful to avoid mosquito bites.

Of course, as with any live vaccine, the danger is a function of the degree of immunosuppression. Someone with a normal CD4 count might decide that the danger of getting yellow fever outweighed any theoretical danger from receiving the vaccine.

## **9. *Thymosin..***

(Laura)

Is anyone seeing thymosin alpha and interferon alpha being used for HIV infection? There is a patient at the clinic who has been receiving it for approximately 2 years (started in combination with an AZT-containing regimen).

## **10. *Topical Cidofovir***

(Jinell)

We have a patient here with HUMAN PAPILLOMA VIRUS, with symptomatic lesions on his skin; mostly on his face. He has been using a compounded cream containing CIDOFOVIR. A local pharmacist makes this cream, and uses injectable CIDOFOVIR (VISTIDE). His dermatologist recommended this treatment. The problem is that Cidofovir is no longer available in Canada (via Pharmacia-UpJohn) as this med is being taken off of the market. I have contacted the United States, and they said they cannot provide it to us by any means (No special access or compassionate use available).

This patient claims that cidofovir works for him, and has repeatedly requested that we find a way to get it.

One alternative is for the patient to go to the states to get it himself. But cost is an issue, and this would only be solving things short term. Based on your clinical experience, have you encountered alternative treatments for HPV?

I did a medline search/Pubmed, and I could only find treatments for HPV lesions in the genital/rectal/anal areas; and most treatments are oncology related meds as opposed to antiviral stuff. Even the papers in this area is scant! Cidofovir is the only antiretroviral mentioned for HPV. I was wondering if the other antiretrovirals would work?!

If there are any ideas you can provide, please do!

## **Drug Interactions**

### **1. Efavirenz & Rifampin**

(Linda)

Do you suggest dosage changes to efavirenz in light of approx 25% decrease in EFV concentrations with rifampin? We have a newly diagnosed TB patient & was on NFV so are planning to change to EFV 600mg hs. Thanks.

(Pierre)

See response on medscape.

<http://www.medscape.com/Medscape/HIV/AskExperts/2000/05/AIDS-ae72.html>

### **2. Oral Contraceptives and PIs**

(Natalie)

We have a 14 year old with heavy mensual bleeding that we are considering using an oral contraceptive but she is on amprenavir. What are you adult practitioners doing? Are none of your patients taking oral contraceptives (I assume everyone is on at least one PI)?

(Christine)

We have only had 1 patient taking oral contraceptives while on nelfinavir that I can remember. I can't remember her specific gynecologic problem, however I believe she had a lot of irregular bleeding (and subsequently required a hysterectomy). The oral contraceptives did seem to improve her symptoms at the time and I stressed the fact that nelfinavir decreases the efficacy of oral contraceptives (and thus they should not be used as a form of contraception).

I do not see the problem of starting oral contraceptives (while on a PI) to determine the efficacy in treating symptoms such as heavy menstrual bleeding. Of course it would be important to educate the patient (and parents) about the interaction. This might be a touchy situation in a 14 year-old!

### **3. Carbamazepine and nevirapine**

(Laura)

Another CBZ question,

Psychiatrist wants to rx CBZ for pt who has failed other mood stabilizers.

Patient is receiving nevirapine, abacavir, d4T

I don't think his ARV regimen can be concomitantly used with CBZ as CBZ would likely dramatically lower nevirapine levels, however....

.... does anyone have any words of advice on whether there is a way that it could be done? Has anyone ever gotten nevirapine levels from anywhere?

### **4. Amprenavir & Efavirenz**

(Deborah)

What is everyone doing for dose adjustments with the amprenavir and Sustiva combination? We have been adding ritonavir 200 bid to 1200 bid amprenavir and 600 od Sustiva, as per the Piscitelli poster from Retro. Apparently the addendum to the amprenavir expanded access protocol (which I have not seen myself; only had read to me over the phone) is recommending the following: amprenavir 600 bid, ritonavir 200 bid plus Sustiva 600 od, but they are citing the Piscitelli paper as their reference.

Am I missing something here? I'm interested in hearing what others are doing!

(Pierre)

We don't use amprenavir much but we had exactly the same situation where we were likely underdosing APV. Clinically, we feel safer to use high dose of APV (1200mg po BID with RTV 200mg BID) as described in Retrovirus conference. Furthermore, in a salvage setting, I believe we should maximize drug levels.

Find attach slides from Dr Leblanc's presentation on RTV boosting APV levels with EFV. Hope you will find them useful.

Personally, I'd go 1200mg regardless of the protocol.

(Jeff)

All of our patients on AMP are currently getting 1200 mg BID, and if on EFA (or NEV) they also get RTV 200 mg BID if they can tolerate it; a few

have adjusted to tolerable total daily doses of RTV 200 - 300 mg per day.

(Laura)

Some other combinations studied at the 1st International Workshop on Clinical Pharmacology of HIV therapy, Noordwijk (Netherlands) - March,2000.

1. Lamotte et al. Abs 2.7: APV 450 BID / RTV 100 BID/ EFV 600 QD
2. Degen et al. Abs 2.12: APV 450 BID / RTV 200 BID/ EFV 600 QD

Both regimens were associated with good APV Cmins and AUC

## **5. *Efavirenz and OC***

(Kathy)

Just wondering what you tell women who are on OCs for birth control that are also on Sustiva. I am familiar with Josi data that suggests that there is no decrease in OC conc and perhaps even an increase although this was only a single dose study. Does everyone feel comfortable enough with this study to tell women that it is okay to rely on this method of Birth Control?? ie without mutidose data. Glenda you probably see the most women in your practice. What do you tell your women?

(Glenda)

We tend to be very wary about using Efavirenz in women who might get pregnant, due to the teratogenic effects seen in monkeys (mid-line defects). Here in BC , we can only use efavirenz for salvage therapy or within a study protocol, so our usage is very limited. I make sure I sit down with the woman and explain what we do know and what we don't know about possible concerns if she does get pregnant. Most women chose a second back-up method as well once they hear the concerns ( Condom, female condom)

If someone is using OC's for cycle control, heavy bleeding etc, not as a contraceptive method, and is taking an interacting drug (ritonavir, nelfinavir, nevirapine are most common) I STRESS that they cannot rely on the OC for contraception. The literature says use a higher E oral contraceptive, but there are no guarantees with that either, and side effects are more common. We use depot- provera quite often for women who are looking for longer-term contraception.

## Reports from Working Groups

### Publication Group (Sandy)

Just a reminder.....

- ◆ The next “publication” priority will be the website review. Please send your “bookmarks” to Sandy and she will divide the websites to review among the Network members.
- ◆ Each of the provincial reps are supposed to send a list of community pharmacies to Sandy for distribution of the paper.

### Research

Update from the Research Committee

Members: Ann, Christine, Debbie, Laura, Alice, Natalie

Hello Everyone!

1. The updated pregnancy survey was sent out to the Research group in August by myself (Laura Park-Wyllie)
2. The Research group will be reviewing the document and incorporating any comments. Hopefully this will be completed in the next few weeks.
3. The remaining phases to the project will be split up among the group (see members above... )

The remaining phases include:

- Collection/Integration of modifications to draft survey
- Distribution of finished survey to HIV network members
- Collection and compilation of results from returned surveys
- Draft of project write-up

4. The PK study idea is currently on hold - please see Yasmin Khaliq's assessment of this study (following below).

"I am happy to help design something but I am concerned about this choice of drugs. I understand your interest in it but think there are some problems. Do you want to use healthy volunteers? It would be prudent and likely the only way but these are not without side effects and therefore is not an appealing study to either fund or get through Ethics. Phenytoin I think is best left alone. You would have to dose to steady state of induction that is at least 14 days (some argue 28 days) and that long term will lead to side effects no doubt and non compliance of the volunteers. The effect may not also be present in healthy's. Carbamazepine is likely better but still easy to produce toxicity. You could dose the antiepileptic first to partial Cpss then the ritonavir another 14 days. The second PI is likely not going to make much difference. The problem is you don't want to do single dose

and steady state takes so long with these drugs b/c of autoinduction of all of them. Yikes - a likely very difficult study. A standard two period drug interaction study costs \$100K - this one will cost much more. Esp multicenter Do you have any other ideas that may be easier? Good luck and keep me in the loop if you don't mind. Yasmin

### **Communications (Alfred)**

Any updates?

### **Education (Glenda)**

Any updates?

### **Additional News**

#### **In Print**

Kovacs JA, Masur H. Drug Therapy: Prophylaxis against Opportunistic Infections in Patients with Human Immunodeficiency Virus Infection. *NEJM* 2000; 342 (19) :1416.

Acute tubulointerstitial nephritis attributable to indinavir therapy, Jaradat,M., Phillips,C., Yum,M.N., Cushing,H., Moe,S.: *American Journal of Kidney Diseases*,35 (4):E161-E165 (2000 Apr) Article

NJ Ostrop, KA Hallett, MJ Gill. Long-Term Patient Adherence to Antiretroviral Therapy. *Ann Pharmacother* 2000; 34:703.

Maximum suppression of HIV replication leads to the restoration of HIV-specific responses in early HIV disease. Al\_Harhi,L., Siegel,J., Spritzler,J., Pottage,J., Agnoli,M., Landay,A. *AIDS* 14 (7):761\_770 (2000 May 5).

Efficacy and safety of combination therapy with interferon-alpha2b and ribavirin for chronic hepatitis C in HIV-infected patients. Landau,A., Batisse,D., Van Huyen,J.P.D., Piketty,C., Bloch,F., Pialoux,G., Belec,L., Petite,J.P., Weiss,L., Kazatchkine,M. *AIDS* 14 (7):839\_844 (2000 May 5)

Purdy BD, Raymond AM, Lesar TS. Antiretroviral Prescribing Errors in Hospitalized Patients. *Ann Pharmacother* 2000; 34:833.

Gangar M, Arias G, O'Brien JG, Kemper CA. Frequency of Cutaneous Reactions on Rechallenge with Nevirapine and Delavirdine. *Ann Pharmacother* 2000; 34: 839.

The steady-state pharmacokinetics of nevirapine during once daily and twice daily dosing in HIV-1-infected individuals, Van Heeswijk,R.P.G., Veldkamp,A.I., Mulder,J.W., Meenhorst,P.L., Wit,F.W.N.M., Lange,J.M.A., Danner,S.A., Foudraine,N.A., Kwakkelstein,M.O., Reiss,P., Beijnen,J.H., Hoetelmans,R.M.W. *AIDS* 14 (8):F77-F82 (2000 May 26)

Immunologic and Virologic Effects of Subcutaneous Interleukin 2 in Combination With Antiretroviral Therapy: A Randomized Controlled Trial. *JAMA* 2000; 284:183.

R. T. Davey, Jr, R. L. Murphy, F. M. Graziano,  
S. L. Boswell, A.T. Pavia, M. Cancio, J. P. Nadler,  
D. G. Chaitt, R. L. Dewar, D. K. Sahner,  
A.-M. Duliege, W. B. Capra, W.-P. Leong,  
M. A. Giedlin, H. C. Lane, J. O. Kahn

Reduction in Mortality With Availability of Antiretroviral Therapy for Children With Perinatal HIV-1 Infection. *JAMA* 2000; 284 (July 12, 2000)

M. de Martino, P.-A. Tovo, M. Balducci, L. Galli, C. Gabiano, G. Rezza, P. Pezzotti; for the Italian Register for HIV Infection in Children and the Italian National AIDS Registry

Risk of Cancer in Children With AIDS. *JAMA* 2000; 284 (July 12, 2000)

R. J. Biggar, M. Frisch, J. J. Goedert;  
for the AIDS-Cancer Match Registry Study Group

Current Evidence and Future Directions for Targeting HIV Entry: Therapeutic and Prophylactic Strategies. *JAMA* 2000; 284 (July 12, 2000)

M. P. D'Souza, J. S. Cairns, S. F. Plaeger

Immune Restoration With Antiretroviral Therapies: Implications for Clinical Management. *JAMA* 2000; 284 (July 12, 2000)

M. M. Lederman, H. Valdez

Predictors of self-reported adherence and plasma HIV concentrations in patients on multidrug antiretroviral regimens. Gifford,A.L., Bormann,J.E., Shively,M.J., Wright,B.C., Richman,D.D., Bozzette,S.A. *Journal of Acquired Immune Deficiency Syndromes* 23 (5):386-395 (2000 Apr 15)

Hit HIV-1 hard, but only when necessary. Harrington,M., Carpenter,C.C.J. *Lancet* 355 (9221):2147-2152 (2000 Jun 17)

Metformin in the Treatment of HIV Lipodystrophy Syndrome: A Randomized Controlled Trial, JAMA, June 26, 2000

Discontinuing or withholding primary prophylaxis against Mycobacterium avium in patients on successful antiretroviral combination therapy. The Swiss HIV Cohort Study. , Furrer,H., Telenti,A., Rossi,M., Ledergerber,B., Swiss HIV Cohort Study. AIDS 14 (10):1409-1412 (2000 Jul 7) Article

Adherence to Protease Inhibitor Therapy and Outcomes in Patients With HIV Infection. Annals of Internal Medicine - July 4, 2000.

Health-related quality of life in patients with human immunodeficiency virus infection in the United States: Results from the HIV cost and services utilization study. Hays,R.D., Cunningham,W.E., Sherbourne,C.D., Wilson,I.B., Wu,A.W., Cleary,P.D., McCaffrey,D.F., Fleishman,J.A., Crystal,S., Collins,R., Eggan,F., Shapiro,M.F., Bozzette,S.A. American Journal of Medicine 108 (9):714-722 (2000 Jun 15)

AIDS across Europe, 1994-98: the EuroSIDA study. Mocroft,A., Katlama,C., Johnson,A.M., Pradier,C., Antunes,F., Mulcahy,F., Chiesi,A., Phillips,A.N., Kirk,O., Lundgren,J.D., EuroSIDA Study Grp. Lancet 356 (9226):291-296 (2000 Jul 22)

## Quotes on Life and Living.....

The less routine the more life.  
~ Amos Bronson Alcott ~

Life is a long lesson in humility.  
~ Sir James M. Barrie ~

You have to do what you love to do, not get stuck in that comfort zone of a regular job. Life is not a dress rehearsal. This is it.  
~ Lucinda Basset ~

In the game of life it's a good idea to have a few early losses, which relieves you of the pressure of trying to maintain an undefeated season.  
~ Bill Baughan ~

Life is raw material. We are artisans. We can sculpt our existence into something beautiful, or debase it into ugliness. It's in our hands.  
~ Cathy Better ~

Life consists not in holding good cards but in playing those you hold well.  
~ Josh Billings ~

It is not how many years we live, but rather what we do with them.  
~ Evangeline Cory Booth ~

Real life seems to have no plots.  
~ Ivy Compton Burnett ~

Optimism and humor are the grease and glue of life. Without both of them we would never have survived our captivity.  
~ Philip Butler ~

Life is one long process of getting tired.  
~ Samuel Butler ~

In between goals is a thing called life, that has to be lived and enjoyed.  
~ Sid Caesar ~

The tragedy of life is not so much what men suffer, but rather what they miss.  
~ Thomas Carlyle ~