namely, that a second GVH cannot occur in the presence of an ongoing GVH. If this were true in HIV infected patients, GVH suppressor $CD8^+$ T cells would need to be induced following each mismatched blood product transfusion to eliminate all alloreactive donor cells. Considering the degree of immunodeficiency that exists in advanced AIDS patients, many of whom have neither functional CD4 nor CD8 immunity, and who still fail to develop GVH following blood product transfusions, I consider this an unlikely hypothesis. The debate over which hypothesis is correct emphasizes the need to understand more about the immunopathogenesis of HIV infection, an issue on which we certainly agree.

Arthur J. Ammann
Health Advisory Board
Research Programs
Pediatric AIDS Foundation
Santa Monica, California

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HTLV-I–Associated Myelopathy in Venezuela

To the Editor: Human retroviruses, although recently identified, have been the focus of much attention since they are linked to neoplasia and chronic degenerative diseases. The human T-cell lymphotropic virus type I (HTLV-I), isolated in 1980 (1), is the etiologic agent of human adult T-cell leukemia (2) and HTLV-I associated myelopathy (HAM) (3,4). In 1982, a second type of HTLV was described (HTLV-II) (5); lately antibodies to HTLV-II were found to be highly prevalent in IV-drug users (6). Interestingly, HTLV-II endemic asymptomatic infection has been reported among many isolated Amerindian groups in the Americas (7–10), but the role of HTLV-II in human diseases has not been established.

Although antibodies to HTLV-I have been identified worldwide, marked geographic variation has been reported; one major focus of HTLV-I infection has been identified in the Caribbean (11) and in Tumaco, a port in the Pacific coast of Colombia (12,13).

In Venezuela, we have recently reported a general HTLV-I seroprevalence of 0.39% when "mestizos" (admixture of Caucasian, Indians, and Negroes) were studied; five ethnic groups of Amerindians were free of HTLV-I/II (14), and two were highly seropositive for HTLV-II (10).

Although SPP is not highly prevalent in Venezuela, we undertook a study of antibodies to HTLV-I and II in 14 patients with clinical diagnosis of spastic paraparesis (SPP). As controls, other neurological diseases, such as multiple sclerosis (MS) (n = 10) and chronic peripheral polyneuropathy (CPP) (n = 6) were included. Antibodies to HTLV-I and HTLV-II were screened by ELISA (Recombinant HTLV-I/II EIA Envelope kit, Cambridge Biotech) and indirect immunofluorescence (IF); confirmatory tests were done by Western blot (HTLV I/II Western blot kit, Cambridge Biotech) and typing for HTLV subtypes by IF-serum titration against infected cell lines (MT2 for HTLV-I and MOT for HTLV-II) as previously described (10). Six of 14 (three males and three females) TSP patients had antibodies to HTLV by EIA and WB; all six sera typed for HTLV-I by at least a fourfold higher titer as compared to HTLV-II (Table 1). We collected samples on three clinically asymptomatic spouses of seropositive SSP patients, two of which were also seropositive for HTLV-I (Table 1). None of the 10 MS and six CPP had antibodies to HTLV. Interestingly enough, five of six HTLV-I positive SPP patients are either blacks (2/6) or mixed African ancestry (3/6); one of the blacks is a female, originally from Colombia with a sexual partner from El Tumaco. The remaining patient is caucasoid, and black ancestry could not be documented; these data are in agreement with previous reports, where seropositivity is almost exclusively restricted to individuals of African descent or mixed African ancestry.

TABLE 1. *Antibodies to HTLV-I/II in TSP patients and spouses*

	EIA	WB	IF antibody titer[a], HTLV-I/HTLV-II
Patient			
1	R	All bands	16,384/4,096
2	R	All bands	8,192/1,024
3	R	All bands	32,768/8,192
4	R	All bands	8,192/1,024
5	R	All bands	16,384/1,024
6	R	All bands	32/8
Spouses			
H 1	R	All bands	512/256
W 5	R	All bands	256/64

EIA, enzyme immunoassay; WB, Western blot; H, husband; W, wife.
[a] Fourfold serial dilution: HTLV-I/MT2, HTLV-II/MOT.

We have demonstrated for the first time the presence of HTLV-I–associated chronic myelopathy in the Venezuelan population; we have also shown evidence of sexual transmission among spouses; ongoing studies will clarify whether vertical transmission has occurred to children of seropositive women.

The evidence of HTLV-I–associated diseases plus the general seroprevalence of 0.39% among healthy population (14) raises the question of blood safety and new policies on blood bank about mandatory screening for HTLV-I/II.

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*Mercedes Zabaleta
†Jorge Peralta
†Julio Birges
*Nicolas Bianco

*Gloria Echeverria de Perez
*Institute of Immunology
†Neurology Service
University Hospital
Faculty of Medicine
Central University of Venezuela
Caracas, Venezuela

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Changes in HIV Risk Behavior Among French Heterosexuals: Patterns of Sexual Monogamy and Condom Use Between 1988 and 1991

To the Editor: The potential for an AIDS epidemic among French heterosexuals remains topical. The total number of AIDS cases continues to increase, and, in France, the proportion of heterosexuals rose from 9.9% in 1988 to 13.4% in 1992 (1). However, AIDS statistics do not show the recent changes in infection rates, due to the long incubation time. Therefore, one approach is to investigate directly the possible recent variation in HIV high-risk behavior. This letter (1) compares the data obtained in two national surveys performed in 1988 and 1991. Study I was carried out in 1988, in three countries, under the auspices of the Project Hope Center for Health Affairs, to assess the prevalence of AIDS high risk behavior in France, the U.K. and the U.S. (2). Study II is a national survey of France conducted three years later (3). The present analysis concerns sexually active 21–50-year-old heterosexuals, with 664 men and 757 women in Study I and 5,741 men and 6,853 women in Study II.

TABLE 1. *Percentage of respondents reporting multipartnerships (at least two sexual partners over the previous year)*

Age (years)	Study I (%)	Study II (%)
Women		
21–24	28.5	10.5
25–34	11.0	6.4
35–50	4.7	4.0
Men		
21–24	33.3	24.9
25–34	20.1	13.2
35–50	15.3	9.5

The proportion of multipartner men, defined as having two or more partners over the past 12 months, decreased from 20.3% to 11.6% between Study I and Study II. In women, the trend toward monogamous relationships has visibly increased, from 11.6% reporting more than one partner in Study 1 to 5.7% in Study II. These global proportions overlayed differences according to the age groups. From 1988 to 1991, the percentages of respondents who reported having two or more sexual partners during the previous year declined, whatever the sex-age group, except for that of women over 35, which remained stable (Table 1). This trend was also observed in a survey conducted in March 1990 among heterosexuals living in the Paris region; 28% reported monogamy or fewer partners in response to the AIDS epidemic (4). Another change observed was a decrease in the proportion of men having intercourse with female prostitutes over the last five years: from 7.1% in 1988 to 4.1% in 1991.

French public health campaigns promote HIV antibody testing as part of AIDS prevention programs; free and anonymous testing is available at counseling sites since 1988. In addition HIV testing is systematically proposed at prenatal or prenuptial tests and concerns as much as 40% of the general practioners' prescriptions (5). An increasing number of respondents reported HIV antibody testing: 15.4% in Study I and 26.7% in Study II. In 1988, high correlations between HIV antibody testing and behavioral risk were observed (6). Three years later, the same positive trend is still observed between multirelationships and testing. The single partner respondents were less likely to be tested than the multipartners both in