RE$ULTS

*   As regards to the distance travelled by polymorphon-
    unclear leukocytes (PMNL) from their site of inocu-
    lation towards the site of the chemoattractant,
    tables 1,1$_a$,1$_b$ and 1$_c$ show the following :-

(1) In insulin - dependent (I.D.) diabetics :

   .   The least distance travelled by PMNL was 31 μm.
       Which was found in one case (9.09%) and the maximum
       distance was 49 μm. and was found in two cases(18.18%).

   .   The mean value of the 11 cases was 39.73 μm.

(2) In non insulin - dependent (N.I.D.) diabetics :

   .   The least distance travelled by PMNL   was 38 μm.
       which was found in three cases (15.79%) while the
       maximum distance was 68 μm. and was found in two
       cases (10.53%).

   .   The mean value of the 19 cases was 55.16 μm.

(3) In the control group :

   .   The least distance travelled by PMNL was 79 μm.

which was found in three cases (10%) and the maximum

distance was 110 μm. and was found in one case (3.33%).

. The mean value of the 30 controls was 86.87 μm.

* As regards to age, tables 2_a and 2_b show :-

(1) In N.I.D. diabetics :

I. 5 cases (26.31%) out of 19 were aging from 30-40 years
and the least distance migrated was 39 μm. which was
found in one case (20%) , while the maximum distance
was 68 μm. , that was found in one case (20%).

- . The mean value of the five cases was 53.80 μm.

II. 6 cases (31.58%), were aging from 40-50 years, and
the least distance was 38 μm by one case (16.67%),
while the maximum distance was 67 μm. and was found
in one case (16.67%).

- The mean value of the six cases was 54 μm.

III. 8 cases (42.11%) , were aging above 55 years (55-64)
and the least distance in them was 38 μm. which was
found in two cases (25%) , and the maximum was 67 μm.
that was found in one case (12.50%).

- The mean value of the eight cases was 53.13 μm.

(2) In I.D. diabetics :

I. 3 cases (27.28%) out of 11, were aging from 10-25 years and the least distance migrated by PMNL was 35 μm. which was found in one case (33.33%),while the maximum distance was 49 μm. and was foun in one case (33.33%).

- The mean value of the three cases was 40.33 μm.

II. 4 case (36.36%), were aging from 25-40 years, and the least distance was 33 μm. which was found in one case (25%), while the maximum was 43 μm. and was found in one case (25%).

- The mean value of the four cases was 39 μm.

III. 4 cases (36.36%), were aging above 40 years (40-48) and the least distance migrated was 31 μm. in one case (25%), while the maximum distance was 49 μm. and was found in one case (25%).

- The mean value of these four cases was 40.5 μm.

* As regards to sex, table3 shows :-

(1) In N.I.D. diabetics :-

I. 13 cases (68.42%) out of 19 were males, and the

least distance migrated was 38 μm. and was found in one case (7.69%), while the maximum distance was 68 μm. which was found in one case (7.69%).

- The mean value of the thirteen male cases was 55.2 μm.

II. 6 cases (31.58%), were females, and the least distance was 38 μm. which was found in two cases (33.33%), while the maximum was 68 μm. and was found in one case (16.16%).

- The mean value of the six female cases was 55 μm.

(2) In I.D. diabetics :

I 6 cases (54.54%) out of 11 were males, and the least distance migrated was 31 μm. that was found in one case (16.16%), while the maximum distance was 49 μm which was found in one case (16.16%).

- The mean value of the six male cases was 40.33 μm.

II. 5 cases (45.46%) were females, and the least distance migrated was 33 μm. which was found in one case (20%), while the maximum was 49 μm. and was found in one case (20%).

- The mean value of the five female cases was 39 μm.

* As regards to the duration of diabetes,tables 4_a and 4_b show :-

(1) In N.I.D. diabetics :-

I. 9 cases (47.37%) out of 19 were with a duration of 1-11 years, and the least distance migrated was 39 μm. which was found in two cases (22.22%), while the maximum was 66 μm. and was found in one case(11.11%).

- The mean value of the nine cases was 53.44. μm.

II. 10 cases (52.63%) were with a duration of 11-22 years, and the least distance was 38 μm. which was found in four cases (40%) , while the maximum distance was 68 μm and was found in one case (10%).

- The mean value of the ten cases was 53.7 μm.

(2) In I.D. diabetics :-

I. 5 cases (45.45%) out of 11 were with a duration of 1-8 years, and the least distance migrated was 33 μm, which was found in one case (20%) , while the maximum was 49 μm. and was found in one cse (20%).

- The mean value of the five cases was 39 μm.

II. 6 cases (54.55%) were with a duration of 8- 16 years, and the least distance was 31 μm. which was found in one case (16.66%), while the maximum was 49 μm. and was found in one case (16.66%).

- The mean value of the 6 cases was 40.3 μm.

Table 1 : The distance migrated by PMNL in the two types of diabetics and in controls.

Group	No. of cases	%	Distance migxated by PMNL in μm.		
			range	mean	S.D
N.I.D.	19	63.33%	38 -68	55.16	11.73
I.D.	11	36.67%	31 -49	39.73	5.85
Control	30	100%	79 -110	86.87	7.84

. N.I.D.   = Non insulin - dependent.

. I.D.   = Insulin - dependent

. S.D.   = Standard deviation.

Table 1$_a$:   Distance migrated by PMNL   of both N.I.D.

   diabetics and controls.

Group	No. of cases	%	Distance migrated by PMNL in µm.				
			range	mean	S.D.	t	p
N.I.D [*]	19	63.33	38-68	55.16	11.73		
						11.35	<0.01
Control	19	63.33	79-110	86.87	7.84		

[*] Non insulin -dependent

Table 1$_b$:   Distance migrated by PMNL   of both I.D. diabetics

   and controls.

Group	No. of cases	%	Distance migrated by PMNL in µm.				
			range	mean	S.D.	t	p
I.D. [**]	11	36.67	31-49	39.73	5.85		
						18.11	<0.01
Control	11	36.67	79-110	86.87	7.84		

[**] Insulin-dependent

Table 1$_c$: Distance migrated by PMNL of both

N.I.D. and I.D. diabetics

Group	No.	%	Distance migrated by PMNL in μm				
			range	mean	S.D.	t	p
N.I.D.*	19	63.33	38-68	55.16	11.73	4.06	<0.01
I.D.**	11	36.67	31-49	39.73	5.85		

* Non insulin-dependent

** Insulin-dependent

No. = Number of cases

Table 2 $_a$:   Distance migrated by PMNL of N.I.D. diabetics in relation to age in nineteen cases .

Group	Age in years											
	30 - 40 years				40 - 50y.				above 50y.			
	Distance in μm.				Distance in μm.				Distance in μm.			
	No.	range	mean	S.D.	No.	range	mean	S.D.	No.	range	mean	S.D.
N.I.D *	5	39-68	53.8	14.46	6	38-67	54	12.38	8	38-67	53.13	11.67

* Non insulin-dependent

No. = Number of cases

Analysis of variance

	D.F.	Sum of squares	Mean of squares	F. test	P
- among groups	2	2.96	1.48	0.009	>0.05
- Within group	16	2555.7	159.7		
- total	18	2558.6			

Table 2ᵦ : Distance migrated by PMNL of I.D. diabetics in relation to age in eleven cases.

Group		Age in years											
		10 - 25 years				25-40 years				above 40 years			
		Distance in μm.				Distance in μm.				Distance in μm.			
	No.	range	mean	S.D.	No.	range	mean	S.D.	No.	range	mean	S.D.
I.D. **	3	35-49	40.33	7.57	4	33-43	39	4.24	4	31-49	40.5	7.42

** Insulin-dependent

No. =Number of cases

Analysis of variance

	D.F.	Sum of squares	mean of squares	F.test	p
- among groups	2	5.24	2.62	0.06	>0.05
- within group	8	333.7	41.7		
- total	10	338.9			

Table 3: Distance migrated by PMNL of both N.I.D. and I.D. diabetics in relation to sex in eleven cases.

| Group | Sex | | | | | | | | | |
| | ♂ Distance in μm. | | | | ♀ Distance in μm. | | | | | |
	No.	range	mean	S.D.	No.	range	mean	S.D.	t	p
N.I.D. *	13	38-68	55.2	12.37	6	38-68	55	13.61	0.147	>0.05
I.D. **	6	31-49	40.33	6.06	5	33-49	39	6.2	0.36	>0.05

* Non insulin-dependent

** Insulin-dependent

No. = Number of cases

Table 4$_a$:   Distance migrated by PMNL of N.I.D. diabetics in relation to duration of diabetes in nineteen cases .

Group	Duration of diabetes									
	1 - 11 years				11 - 22 years					
	Distance in μm.				Distance in μm.					
	No	range	mean	S.D.	No	range	mean	S.D.	t	p
N.I.D. *	9	39-66	53.44	10.17	10	38-68	53.7	13.9	0.004	>0.05

* Non insulin-dependent

No, = Number of cases

Table 4$_b$: Distance migrated by PMNL of I.D. diabetics in relation to duration of diabetes in eleven cases.

Group		Duration of diabetes									
		1 - 8 years				8 - 16 years					
		Distance in μm.				Distance in μm.					
	No.	range	mean	S.D.	No	range	mean	S.D.	t	p
I.D. **	5	33-49	39	6.2	6	31-49	40.33	6.06	0.36	>0.05

** Insulin-dependent

No. = Number of cases