

RESULTS AND DISCUSSION

In this study, 100 diabetic patients were enrolled. The one hundred patients were divided into two groups: fifty were assigned to the intervention group and fifty were assigned to the nonintervention group (Figure 4.1). The follow-up for both groups lasted for four months, and overall adherence was excellent with a 97% retention rate. Ninety-seven participants successfully completed the study. Of these, 49 participants were in the intervention group, and the other 48 participants were in the nonintervention group. The lost to follow up participants were one in the intervention group due to failure to contact him and two participants in the nonintervention group due to refusal to come for follow-up. The researcher performed both statistical analyses, intention to treat and per protocol analyses.

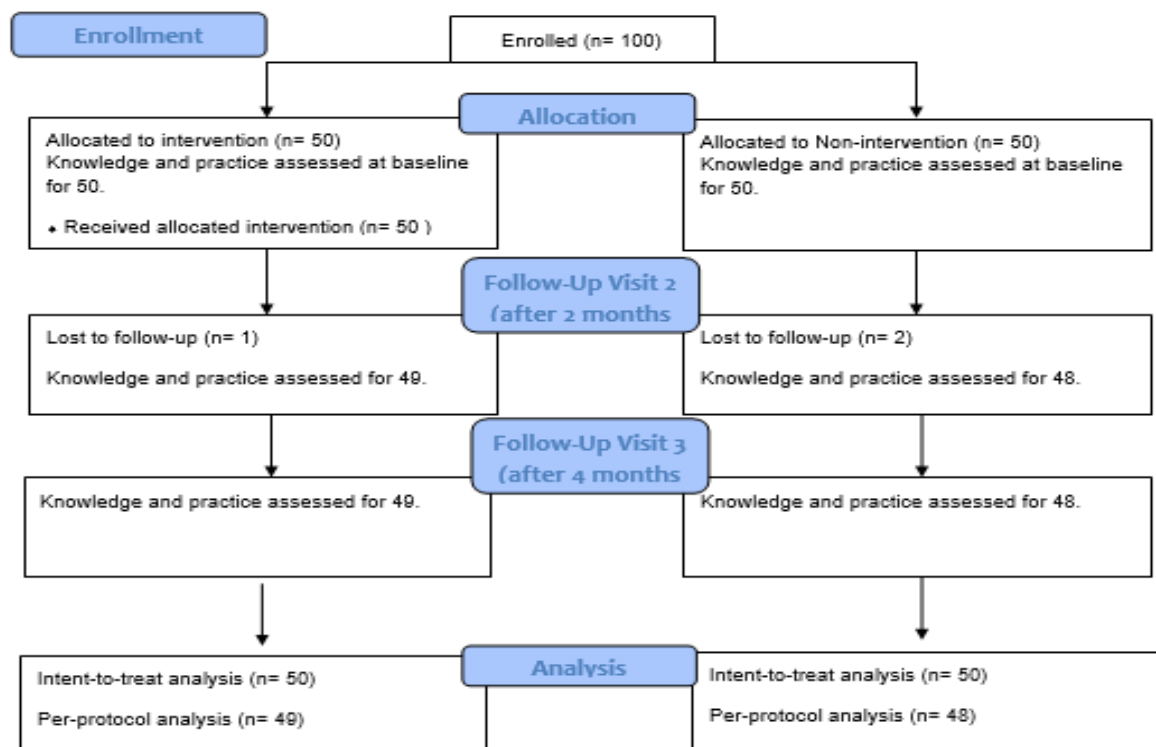


Figure (4.1): Flow diagram of participants in both the nonintervention and intervention groups (n = 100) (El-Horraya polyclinic, 2023).

The results of the present study are presented as follows:

4.1. Descriptive data

4.1.1. Sociodemographic characteristics.

4.1.2. Participants' associated comorbidities.

4.1.3. Descriptive data about diabetes, diabetes treatment characteristics, and medical history.

4.2. Knowledge assessment

4.2.1. Knowledge scores and categories pre- and postintervention.

4.2.2. Within group difference (time effect) regarding knowledge scores and levels.

4.2.3. Proportions of the correct answers to the knowledge assessment questions at each visit.

4.3. Practice assessment

4.3.1. Part one of the practice assessment, involved disposing of insulin syringes or pen needles at health care facilities.

4.3.2. Part two of practice assessment.

4.3.2.1. Practice scores and categories pre- and postintervention.

4.3.2.2. Within group difference (time effect) regarding practice scores and levels.

4.3.2.3. Proportions of the correct answers to the practice assessment questions at each visit.

4.3.3. Part three of the practice assessment: Compliance with the program among the intervention group.

4.3.4. Overall Practice Scores

4.1. Descriptive data

4.1.1. Sociodemographic characteristics

Table (4.1) shows the distribution of participating patients according to sociodemographic factors. Their median age and IQR was 61 (IQR: 55 – 66), and the highest percentage of them (78%) were in the age group of 50 years or older. Approximately half of the participants were 60 years old or more.

Males were 54% of the study participants, more than three-quarters of the sampling population were married (77%), and the retired elderly made up half of the patients. Regarding education, the study results showed that more than one-fourth of subjects (28%) reported that they had a graduate and postgraduate certificates, while 3% were illiterate.

Concerning residence, 92% of the participants lived in urban areas, and 8% lived in rural areas. Only 4% of participants shared home with others. Regarding the crowding index, it was found that the median crowding index was 1 (0.7-1.3) which is considered a non-crowding condition. It was found that 41% of the participants had lived in crowded and overcrowded areas. Less than half of the participants (43%) had children at their place of residence .

The sociodemographic characteristics of the intervention and nonintervention groups did not differ significantly, as shown in table (4.1).

Table (4.1): Distribution of the studied diabetic patients according to sociodemographic characteristics (n = 100) (El-Horraya polyclinic, 2023).

Variable	Total (N =100)	Intervention (n = 50)	Nonintervention (n =50)	p- value
Gender				
Male	54 (54%)	28 (56%)	26 (52%)	0.472
Female	46 (46%)	22 (44%)	24 (48%)	
Age, Median (IQR)	61 (55-66)	62 (53-67)	60 (56-66)	0.812
Age Categories				
30 to <40	9 (9%)	4 (8%)	5 (10%)	0.933
40 to <50	13 (13%)	7 (14%)	6 (12%)	
50 to <60	22 (22%)	12 (24%)	10 (20%)	
60 or more	56 (56%)	27 (54%)	29 (58%)	
Marital status				
Widow	19 (19%)	9 (18%)	10 (20%)	1.000
Single	1 (1%)	1 (2%)	0 (0%)	
Married	77 (77%)	38 (76%)	39 (78%)	
Divorced	3 (3%)	2 (4%)	1 (2%)	
Occupation				
Without work (widow)	10 (10%)	5 (10%)	5 (10%)	0.914
Retired	50 (50%)	24 (48%)	26 (52%)	
Employee	40 (40%)	21 (42%)	19 (38%)	
Education				
Illiterate	3 (3%)	1 (2%)	2 (4%)	0.893
Read and write	7 (7%)	5 (10%)	2 (4%)	
Basic education	19 (19%)	8 (16%)	11 (22%)	
Diploma certificate	18 (18%)	10 (20%)	8 (16%)	
High diploma certificate	25 (25%)	12 (24%)	13 (26%)	
Graduate	24 (24%)	12 (24%)	12 (24%)	
Postgraduate	4 (4%)	2 (4%)	2 (4%)	
Residence area				
Civilized	92 (92%)	44 (88%)	48 (96%)	0.396
Rural	8 (8%)	6 (4%)	2 (4%)	
House characteristics				
House sharing	4 (4%)	3 (6%)	1 (2%)	0.617
Number of rooms	3 (3-3)	3 (3-4)	3 (3-3)	0.210
Number of bedrooms	2 (2-2)	2 (2-3)	2 (2-2)	0.210
Number of persons	3 (2-4)	3 (2-4)	3 (2-4)	0.824
Presence of children	43(43%)	21 (42%)	22(44%)	0.678
Crowding index	1 (0.7-1.3)	1 (0.7-1.3)	1 (0.7-1.45)	0.601
Crowding index categories				
Not Crowded	59 (59%)	32 (64%)	27 (54%)	0.563
Crowded	24 (24%)	10 (20%)	14 (28%)	
Overcrowded	17 (17%)	8 (16%)	9 (18%)	