



Introduction

- Personality traits could be a vital role to affect the status of self-efficacy and spiritual well-being that patients with colorectal cancer (CRC) perceived.
- However, there is no study to examine the relationships between type D personality traits, self-efficacy and spiritual well-being in CRC patients.

Purpose

- To explore (1) the relationship between type D personality traits (negative affectively and social inhibition), self-efficacy and spiritual well-being, and (2) significant factors associated with spiritual well-being in CRC patients.

Methods

- **Participant:** 416 CRC patients diagnosed within 5 years in surgery clinics.
- **Study design:** A cross-sectional study
- **Setting:** 2 medical centers in northern Taiwan
- **Measurement:** (1) Type D personality traits: Type D Scale-14; (2) Self-efficacy: Cancer Behavior Inventory; (3) Spiritual well-being: Functional Assessment of Chronic Illness Therapy Spiritual Well-Being.
- **Analysis:** Multiple regression was used to examine the relationships between type D personality traits, self-efficacy and spiritual well-being after controlling other confounding factors.

Results

- The level of spiritual well-being was negatively associated with negative affectively and social inhibition (Table 3).
- The level of self-efficacy was negatively associated with negative affectively and social inhibition.
- Negative affectivity and self-efficacy were the significant factors affecting the spiritual well-being status (Table 4).

Conclusions & Clinical Implication

- Both negative affectively and social inhibition were crucial factors negatively affecting self-efficacy and spiritual well-being status in CRC patients.
- To help CRC patients have better spiritual well-being in their survivor life, type D personality may allow to better understand patients’ inner experience and improve communication between patient and professionals in order to provide suitable interventions.

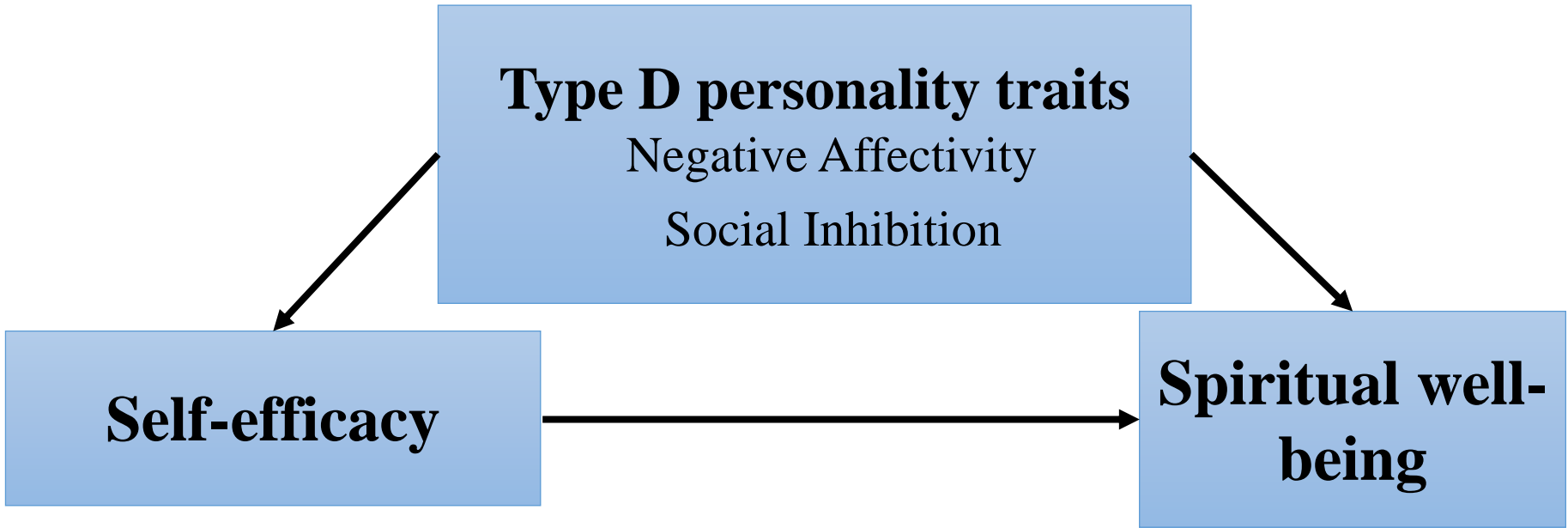


Table 1. Demographic Characteristics in Three Group (N=416)

Demographic Characteristics	≤1 year (n=207)	1-3 years (n=148)	≥3 years (n=61)	F	p ^a
	n(%)	n(%)	n(%)		
Age (Mean/SD)	61.68(11.33)	62.70(11.8)	64.25(11.86)	1.272	0.281
Gender				0.557	0.757
Male	131(63.3)	88(59.5)	37(60.7)		
Female	76(36.7)	60(40.5)	24(39.9)		
Family status				6.973	0.031
Live with family	189(91.3)	141(95.3)	61(100)		
Live alone	18(8.7)	7(4.7)	0		

Table 2 Clinical Disease Characteristics in Three Group (N=416)

Demographic Characteristics	≤1 year (n=207)	1-3 years (n=148)	≥3 years (n=61)	F	p ^a	Post Hoc ^b
Functional status (KPS) Mean(SD)	88.84(5.88)	91.15(5.54)	91.80(5.0)	10.508	<0.001	≤1 year <1-3 years ≤1 year <≥3 years
Diagnose n(%)				2.873	0.579	
Colon cancer	148(71.4)	100(67.4)	45 (73.3)			
Rectal cancer	59(28.6)	48(32.6)	14 (23.3)			
Others(Cecum)	0	0	2 (3.3)			
Stage n(%)				1.898	0.754	
I	59(28.6)	61(41.3)	26 (43.3)			
II	70(33.3)	42(28.3)	20 (33.3)			
III	78(38.1)	45(30.4)	15 (23.3)			

Table 3 Examining the correlation between Type D Personality and Spiritual Well-Being (N=416)

Variable	r (p ^a)				
	Type D	Negative Affectivity	Social Inhibition	Self-efficacy	Spiritual Well-Being
Type D	1	0.849 (<0.001)	0.816 (<0.001)	-0.419 (<0.001)	-0.328 (<0.001)
Negative Affectivity		1	0.388(<0.001)	-0.394 (<0.001)	-0.361 (<0.001)
Social Inhibition			1	-0.300 (<0.001)	-0.178 (<0.001)
Self-efficacy				1	0.529 (<0.001)
Spiritual Well-Being					1

Table 4 Examining the associated factors with Spiritual Well-Being in the Multiple Regression *enter method* (N=416)

Variable	Unstandardized Coefficients	Std. Error	Standardized Coefficients	t	Sig.
Family status (0=Live with family; 1= Live alone)	0.151	1.302	0.005	0.116	0.908
Religion affiliation (0=no; 1=yes)	-1.072	0.641	-0.069	-1.673	0.095
Functional status (KPS)	0.103	0.057	0.079	1.788	0.075
Accepting chemotherapy	-0.687	0.837	-0.036	-0.821	0.412
Negative Affectivity	-0.197	0.058	-0.163	-3.371	0.001
Social Inhibition	0.052	0.060	0.039	0.867	0.386
Self-efficacy	0.181	0.018	0.458	9.967	<0.001
Group (0=≤1 year; 1=1-3 years)	0.250	0.716	0.016	0.349	0.727
Group (0=≤1 year; 1=≥3years)	0.414	0.970	0.020	0.426	0.670
Intercept	4.223	5.342		0.791	0.430
R ²					0.322
ΔR ²					0.307
F					21.464
P					<0.001
Durbin-Watson					1.904

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