

**SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, DC 20549**

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**SCHEDULE 13D  
(Rule 13d-101)**

INFORMATION TO BE INCLUDED IN STATEMENTS FILED PURSUANT  
TO RULE 13d-1(a) AND AMENDMENTS THERETO FILED  
PURSUANT TO RULE 13d-2(a)

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**CVD Equipment Corp**  
(Name of Issuer)

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**Common Stock, par value \$0.01 per share**  
(Title of Class of Securities)

**126601103**  
(CUSIP Number)

**Leonard A. Rosenbaum  
1860 Smithtown Avenue  
Ronkonkoma, NY 11779  
631-981-7081**

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(Name, Address and Telephone Number of Person Authorized to Receive Notices and Communications)

**September 20, 2005**

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(Date of Event Which Requires Filing of this Statement)

If the filing person has previously filed a statement on Schedule 13G to report the acquisition that is the subject of this Schedule 13D, and is filing this schedule because of Rule 13d-1(e), 13d-1(f) or 13d-1(g), check the following box. ☐

*Note:* Schedules filed in paper format shall include a signed original and five copies of the schedule, including all exhibits. See Rule 13d-7 for other parties to whom copies are to be sent.

(Continued on the following pages)

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<sup>1</sup> The remainder of this cover page shall be filled out for a reporting person's initial filing on this form with respect to the subject class of securities, and for any subsequent amendment containing information which would alter the disclosures provided in a prior cover page.

The information required in the remainder of this cover page shall not be deemed to be "filed" for the purpose of Section 18 of the Securities Exchange Act of 1934 ("Act") or otherwise subject to the liabilities of that section of the Act but shall be subject to all other provisions of the Act (however, see the Notes).

CUSIP No. 126601103

13D

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1.	NAMES OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  <b>Leonard A. Rosenbaum</b>		
2.	CHECK THE APPROPRIATE BOX IF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>		
3.	SEC USE ONLY		
4.	SOURCE OF FUNDS  <b>SC</b>		
5.	CHECK BOX IF DISCLOSURE OF LEGAL PROCEEDINGS IS REQUIRED PURSUANT TO ITEM 2(d) OR 2(e) <input type="checkbox"/>		
6.	CITIZENSHIP OR PLACE OF ORGANIZATION  <b>United States of America</b>		
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7.	SOLE VOTING POWER	<b>1,315,450</b>
	8.	SHARED VOTING POWER	<b>0</b>
	9.	SOLE DISPOSITIVE POWER	<b>1,315,450</b>
	10.	SHARED DISPOSTIVE POWER	<b>0</b>
11.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON <b>1,315,450</b>		
12.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES * <input type="checkbox"/>		
13.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) <b>42.2%</b>		
14.	TYPE OF REPORTING PERSON*  <b>IN</b>		

\* SEE INSTRUCTIONS BEFORE FILLING OUT!

**Item 1. Security and Issuer.**

**Title of Class of Equity Securities:** Common Stock, par value \$0.01 per share

**Name of Issuer:** CVD Equipment Corp, a New York corporation (the "Company")

**Address of Issuer's Principal Executive Offices:** 1860 Smithtown Ave  
Ronkonkoma, NY 11779-7321

**Item 2. Identity and Background.**

- (a) **Name:** Leonard A. Rosenbaum
- (b) **Address:** 1860 Smithtown Avenue  
Ronkonkoma, NY 11779-7321
- (c) **Present principal occupation and name and address of such principal occupation**
- Chief Executive Officer and Chairman of the Board of Directors of the Company
- (d) **Criminal Convictions within the past five years:**
- Mr. Rosenbaum has not been the subject of any criminal proceeding in the previous five years from the date of the statement.
- (e) **Party to a Civil Proceeding in the past five years:**
- During the past five years, Mr. Rosenbaum has not been a party to any civil proceeding of a judicial or administrative body with said proceeding resulting in judgment, decree or final order enjoining future violations of, or prohibiting or mandating activities subject to, federal or state securities laws or finding any violation with respect to such laws.

**Item 3. Source and Amount of Funds or Other Consideration**

These shares were acquired over time by Mr. Rosenbaum in connection with the organization of the Company and his position as Chief Executive Officer.

**Item 4. Purpose of Transaction.**

At present, Mr. Rosenbaum does not have any plans or proposals which relate to or would result in any of the events described in Items (a) through (j) of Item 4 of Schedule 13D.

**Item 5. Interest in Securities of the Issuer.**

(a) **Aggregate Number of Shares Beneficially Owned:** 1,315,450<sup>1</sup>

**Percentage of Securities Beneficially Owned:** 42.2%

(b) Mr. Rosenbaum has sole voting power and sole dispositive power over all 1,315,450 of these shares.

(c) Not Applicable.

(d) Not Applicable.

(e) Not Applicable.

**Item 6. Contracts, Arrangements, Understandings or Relationships with respect to Securities of the Issuer.**

On August 1, 2000, the Company granted to Mr. Rosenbaum an option to purchase up to 10,000 shares of its common stock at an exercise price of \$2.00 per share. These options vested in four equal annual installments beginning on August 1, 2001. All of these options are presently exercisable, and they will expire on August 1, 2007.

On September 23, 2003, the Company granted to Mr. Rosenbaum an option to purchase up to 15,000 shares of its common stock at an exercise price of \$1.40 per share. These options vest in three equal annual installments beginning on September 23, 2004. Mr. Rosenbaum may presently exercise 5,000 of these options. These options will expire on September 23, 2010.

On September 13, 2005, the Company granted to Mr. Rosenbaum an option to purchase up to 21,000 shares of its common stock at an exercise price of \$4.10 per share. Options vest as to 7,000 shares on December 13, 2005 and 1,750 shares on each of January 13, 2007, April 13, 2007, July 13, 2007, October 13, 2007, January 13, 2008, April 13, 2008, July 13, 2008 and October 13, 2008. These options will expire on September 13, 2012.

**Item 7. Material to be Filed as Exhibits**

None

**SIGNATURE**

After reasonable inquiry and to the best of my knowledge and belief, I certify that the information set forth in this statement is true, complete and correct.

Dated: September 20, 2005

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Leonard A. Rosenbaum

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(continued...)

<sup>1</sup> Mr. Rosenbaum owns 1,300,450 of these shares directly and 15,000 through presently exercisable options.